DOCUMENT RESUME

ED 190 743 CE 024 989

TITLE	Teaching and Learning: Strategies for Success in Nursing Education. Faculty Development in Nursing Education Project. Conference Proceedings (Atlanta, Georgia, October 14-16, 1980).
INSTITUTION	Southern Regional Education Board, Atlanta, Ga.
SPONS AGENCY	Public Health Service (DHEW), Arlington, Va. Div. of Nursing.
PUB DATE	80
GRANT	PHS-D10NU02029
NOTE	135p.
EDRS PRICE	MF01/PC06 Plus Postage.
DESCRIPTORS	Affective Objectives; Attitudes; Beliefs; Clinical Experience; Cognitive Objectives; Cultural Awareness; *Desensitization; *Moral Development; Multisensory Learning; *Nursing Education; Postsecondary Education; *Program Effectiveness; Programs; Simulation; *Socialization; Teacher Effectiveness; *Teaching Methods; Values
IDENTIFIERS	*Affective Domain; Cognitive Domain; Piaget (Jean)

ABSTRACT

This publication contains the presentations of the general sessions and special interest groups of the third regional meeting of the Faculty Development in Nursing Education Project (Atlanta, Georgia, October 14-16, 1979). The first two speeches are keynote presentations. Cognitive and Affective Education discusses Piaget's construction of knowledge and teachers' decisions regarding instructional methods for content to be learned by rote and to be known and understood. Affective Education in the Classroom concerns creating an environment for affective learning, teaching strategies for the affective domain, and resources to facilitate affective learning outcomes. The next seven papers are special interest group presentations: (1) Moral Development of Nursing Students: An Issue Confronting Nursing Education, discussing theories and relevance to nursing education; (2) The Socialization Seminar, describing an approach to help students develop professional values, beliefs, and attitudes; (3) Anxiety Desensitization, discussing techniques to minimize and prevent debilitating anxiety levels; (4) The Use of Simulated Learning Experiences and advantages and disadvantages; and (5) three "updates" on activities at four project sites, entitled Eliminating Learning Obstacles, The Impact of Cognitive Styles on Teaching and Learning, and Cultural Awareness. (The tenth paper, Multisensory Instruction, was not presented. It overviews instructional development at Hampton Institute School of Nursing.) (YLB)

****
* Reproductions supplied by EDRS are the best that can be made *
* from the original document. *
****

TEACHING AND LEARNING: STRATEGIES FOR SUCCESS IN NURSING EDUCATION

ED190743

CE 024 989

U.S. DEPARTMENT OF HEALTH, EDUCATION & WELFARE
NATIONAL INSTITUTE OF EDUCATION

THIS DOCUMENT HAS BEEN REPRODUCED EXACTLY AS RECEIVED FROM THE PERSON OR ORGANIZATION ORIGINATING IT. POINTS OF VIEW OR OPINIONS STATED DO NOT NECESSARILY REPRESENT OFFICIAL NATIONAL INSTITUTE OF EDUCATION POSITION OR POLICY.

"PERMISSION TO REPRODUCE THIS MATERIAL HAS BEEN GRANTED BY

B. Schultz

TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)."

Southern Regional Education Board
130 Sixth Street, N.W.
Atlanta, Georgia 30313

1980

TABLE OF CONTENTS

Page

FOREWORD v

INTRODUCTION 1

PRESENTATIONS

Cognitive and Affective Education 3
Milly Cowles

Affective Education in the Classroom 6
Kathleen Mikan

Moral Development of Nursing Students: An Issue Confronting Nursing Education 25
Janet Awtrey

The Socialization Seminar 51
LaRetta Garland

Anxiety Desensitization 66
Sandy Huggins

The Use of Simulated Learning Experiences in Teaching and Evaluating Clinical Nursing Practice 79
Shirley Dooling

Eliminating Learning Obstacles 95
Gail Kettlewell

The Impact of Cognitive Styles on Teaching and Learning . . . 106
Delois Skipwith

Cultural Awareness 115
Norma Rawlings and Ann Morgan

Multisensory Instruction 118
Elnora Daniel

ROSTER OF CONFERENCE PARTICIPANTS 124

LIST OF BOOKS ON DISPLAY 128

MAY 1 6 1980

FOREWORD

The Faculty Development in Nursing Education Project, a three-year grant awarded by the Division of Nursing, DHEW and administered by the Southern Regional Education Board, provides opportunities for nurse educators at 20 institutions in the South to enhance teaching and learning experiences. A regional meeting is held each year of the project period for, but not limited to, nurse educators at the project sites. These meetings provide an opportunity for faculty to share experiences and to address pertinent issues related to teaching and learning.

This publication contains the presentations of the general sessions and special interest groups of the third regional meeting. The theme of the meeting was "Teaching -- Learning: Selecting Strategies For Success."

Eula Aiken, Project Coordinator
Audrey Spector, Program Director

INTRODUCTION

The Third Regional Meeting of the Faculty Development in Nursing Education Project (PHS D10NU02029) convened in Atlanta, Georgia at the Terrace Garden Inn on October 14-16, 1979. This meeting was attended by 130 persons from the 14 SREB states.*

The theme for the meeting was "Teaching -- Learning: Selecting Strategies for Success." This meeting provided an opportunity for participants to: (1) identify elements of effective teaching, (2) discuss effective use of self in teaching and learning situations, (3) discuss techniques for creating dynamic learning experiences, (4) discuss appropriate utilization of selected instructional materials and methods, and (5) gain information about project activities nurse faculty consider effective.

The meeting began on Sunday, October 14, with keynote presentations, "Cognitive and Affective Education," by Kathleen Mikan, Ph.D., Professor and Director of the Learning Resource Center, University of Alabama in Birmingham School of Nursing and Milly Cowles, Ph.D., Associate Dean, School of Education, University of Alabama in Birmingham. These consultants established the framework for the morning sessions on Monday, October 15 where discussion focused on teaching strategies for the cognitive domain and the affective domain.

---

*The 14 member states of the Southern Regional Education Board (SREB) are: Alabama, Arkansas, Florida, Georgia, Kentucky, Louisiana, Maryland, Mississippi, North Carolina, South Carolina, Tennessee, Texas, Virginia, West Virginia.

The afternoon session on Monday, October 15, and morning session on Tuesday, October 16, consisted of the following special interest groups:

Simulation. Shirley Dooling, Ph.D., Dean, University of St. Thomas School of Nursing (Houston, Texas), shared faculty experiences in a special project and discussed the advantages and disadvantages of this teaching approach in nursing education.

Socialization. LaRetta Garland, Ed.D., Professor, Emory University School of Nursing (Atlanta, Georgia), described an approach used to help students develop or modify professional values, beliefs, and attitudes.

Anxiety Desensitization. Sandy Huggins, M.Ed., Staff Development Coordinator, Peachtree-Parkwood Hospital (Atlanta, Georgia), discussed techniques to minimize and to prevent debilitating anxiety levels among students and faculty.

Moral Development. Janet Awtrey, M.S., Associate Professor, University of Alabama in Birmingham School of Nursing, discussed theories related to moral development and the relevance of moral education to nursing education.

The Market Place. Four representatives from three project sites presented an "update" on activities underway at the respective sites.

Delois Skipwith, M.S., Associate Professor, University of Alabama in Birmingham School of Nursing, discussed cognitive styles and the utilization of varied strategies based upon the identification of learning styles.

Gail B. Kettlewell, M.S., Assistant Professor, Developmental English and Reading, Tidewater Community College (Portsmouth, Virginia), described some of the measures employed to overcome learning obstacles.

Norma Rawlings, M.S., and Ann P. Morgan, M.S., Assistant Professors, University of Maryland at Baltimore, shared strategies employed to help faculty become more sensitive to cultural differences and values.

The papers presented at this regional meeting follow.

COGNITIVE AND AFFECTIVE EDUCATION

Milly Cowles
Associate Dean
School of Education
University of Alabama in Birmingham

Somewhere in time and space there must have been a marriage between teaching and learning AND between what is known about the relationship of human development to instruction and instructional theory. Unfortunately, I neither attended the wedding nor had anything to say about the divorce. Much is known and has been written about these elements; however, bridging the gap between this knowledge and actual classroom practice is a big leap.

The argument as to whether one needs only to understand the basic principles of teaching-learning in order to teach well remains pervasive. This is a wasted and foolish argument. Whether one needs to know the subject matter, for example, nursing theory or the various specialties within nursing practice, in order to teach ought to be a foregone conclusion. But, it is equally true that instructors are more effective facilitators of the learning process when they understand important dimensions of the process.

A vital dimension, but not the only one, is OUR understanding of cognition or how we come to know and understand what we know. Psychologists disagree about our being reactive or interactive human beings. For instance, B. F. Skinner, the behaviorist, thinks we react. On the other hand, Jean Piaget sees the development of knowing as an interactive process in which individuals construct their knowledge in concert with a dynamic relationship with the environment. Although Piaget was not thinking of teaching as such when he conducted his basic research, I think his work is of more value to teachers at all levels than other theories.

Piaget asserts that the construction of knowledge involves four basic components. These components are:

> Social transmission. Modeling and language, i.e., what is told to us, are vital elements.
>
> Experiences. This component is dependent upon our constructions in the past.
>
> Maturation. This is the basic unfolding process as genetically programmed dispositions emerge.
>
> Equilibration. This component refers to the process of assimilation and accomodation, i.e., the internalization of values and beliefs.

Basically, there are three kinds of knowledge: 1) social knowledge, what one is told or observes; 2) physical knowledge, what something does; 3) logical-mathematical knowledge, what something is and is not.

Although the content of a discipline, e.g., nursing, will differ, the above notions are applicable in any area and at any age. The teacher has to decide what students need to know and understand as well as what they must be able to "parrot back," e.g. rote learning. Rote learning, i.e., giving back what you transmit socially through language, does not require any understanding. For example, basic vocabulary words in a discipline may be memorized. Examples[1] of content in nursing that require primarily rote learning include: signs and symptoms, drug groups, mathematical conversions, laboratory values, names of medications, drug dosages, skills, e.g., bed-making, basic anatomy, metric values and abbreviations. Among the techniques[2] a teacher can use in designing learning experiences dependent primarily on rote learning are: (1) gaming, (2) study packets, (3) handouts and study guides, (4) computer-assisted instruction, (5) textbooks, (6) simulations, (7) programmed instruction.

---

[1] Identified during the group sessions with Dr. Cowles on October 15.

On the other hand, some content must be known and understood. Among the concepts in nursing that require knowledge and understanding are: professional accountability, patient assessment, the communication process, the problem-solving process, the group process, change and systems.[3] The nurse educator must be able to make the necessary distinctions.

Knowledge about cognition is vital in making such distinctions. The student's maturation, experience, learning opportunities, and ability to assimilate and accommodate are interrelated. Since we cannot observe these processes, we have to be sure that all bases are touched. Adult learners exposed to new materials are no different than kindergarten or nursery school children. They must act on the material. When it is only theoretical, the learners must problem-solve. When it is practical as well as theoretical, they must act on models and real objects in addition to problem-solving.

People must learn what ideas are and are not, and what they mean. Adult learning, to be lasting, must be reflective. It involves seeing relationships and differences, talking and writing about ideas, and putting them into practice.

---

[2] Discussed during group sessions with Dr. Cowles on October 15.

[3] Extracted from the group discussions with Dr. Cowles on October 15.

AFFECTIVE EDUCATION IN THE CLASSROOM

Kathleen Mikan
Professor and Director of Learning Resource Center
School of Nursing
University of Alabama in Birmingham

Traditionally, the emphasis in our American education system has been on gaining knowledge and learning skills, in order to prepare individuals to live in and be productive members of our society. Only recently have educators begun to recognize the importance of the attitudes and values that are being learned along with knowledges and skills. In fact, as knowledge continues to increase exponentially and, almost as rapidly, becomes obsolete, many educators are beginning to believe that the long-range social impact of our formal educational system is probably not the factual knowledge that is gained so much as it is the attitudes, interests, and values that are learned. Thus there is a growing interest among some educators, at all levels of our educational systems, about the importance of teaching of attitudes, values, interests, and appreciations, and pedagogically referred to as the affective domain of learning.

The nursing profession focuses on human caring, and nurses are called upon daily to make decisions about other human beings. Although many of these professional decisions are grounded in nursing knowledge, values, ethical and moral issues, and judgments are often involved. As the knowledges and technologies of medicine expand and become increasingly more complex, it is likely that nurses will be asked increasingly to make more value-laden decisions about the human beings for whom they are caring. If this is true, then, as nurse educators we need to teach students how to make value-laden decisions and to face these decisions with courage, knowledge, and compassion.

Most schools of nursing have within their philosophy a statement which espouses to the teaching of knowledges, attitudes, and skills. However, when the curriculum is examined closely, it is difficult to identify specific curriculum objectives, learning experiences, and evaluation methods that address the teaching of attitudes. Whenever attitudual objectives are identified, they usually are stated in relation to clinical rather than to classroom learning experiences. If we as nurse educators think that it is important for students to develop attitudes, values, interests, and appreciations, then we need to give more attention to creating affective learning experiences--not only in the clinical setting but also in the classroom. Thus, the purpose of this paper is to discuss the need for educators to give more attention to affective learning outcomes, specifically in the classroom. In keeping with the theme of this workshop, special attention will be given to identification of specific ways teachers can create affective learning environments in the classroom. The reader is referred to other resources, given at the end of this article, to obtain more specific information about how to write affective objectives or how to develop and utilize evaluation techniques to measure affective learning outcomes.

Before discussing the need for educators to give more attention to affective learning, it is necessary to identify some similarities and differences between the affective domain and the other two domains, namely cognitive and psychomotor. These three domains--cognitive, affective and psychomotor--were originally created for purposes of developing a taxonomy of learning. Despite the fact that these three domains are often discussed as separate, independent categories, they are not. They are all interrelated and it is difficult to discuss one, especially the affective domain, without also referring to the other two.

The affective domain differs from the other two in that it refers to the emotional learning outcomes that a person experiences as a result of interaction with things, ideas, and people in the environment. The emotional learning outcomes develop as a result of human experiences and as such they are related to some definite stimulus. The stimulus can be an object, a person, an event, an idea, or a concept. Any one of these can serve as a stimulus for the development of attitudes, values, and interests. Based on the fact that learning outcomes result from experiences with a stimulus situation, then the development of the affective domain is interrelated with and, to some extent, dependent upon the cognitive domain. The knowledge one has about or gains from a situation gives form to the development of attitudes, values, and interests. Thus, when teaching for the affective domain, one is dealing with both the cognitive domain (the stimulus situation) and the affective domain (emotional learning).

Although the relationship between the affective domain and the cognitive domain is quite apparent, the relationship of the affective domain to the psychomotor domain is not as obvious. The development of the affective domain may or may not be accompanied by a behavioral component. Attitudes cannot be observed directly, nor are they always expressed in psychomotor behaviors that can be observed, consequently, it is difficult to assess the presence of an attitude with any degree of reliability. Usually, the presence of attitudes is inferred from observations of people's behavior.

Unlike cognitive learning, the outcomes of affective learning cannot be achieved solely by telling or showing. A teacher cannot tell students what attitudes to develop in the same manner one can tell students what knowledge they need to know. It is one thing to talk about a feeling or an attitude, but it is quite another to experience that feeling or attitude. Thus, if one is to teach attitudes, one must provide opportunities for students to experience stimuli that foster the development of desired attitudes, values, interests, and appreciations.

Although the terms attitudes, values, interests, and appreciations do not mean the same thing, these terms will be used interchangeably throughout the remainder of this paper to refer to the learning outcomes that result from learning experiences.

Need For More Attention To The Affective Domain

The development of attitudes is a life-long process. Often teachers are reluctant to become involved with the teaching of attitudes and values. Some of the hesitancy relates to the beliefs that an individual's attitudes, values, and character are private matters and that educators do not have the right to impose a different set of values on another person. However, imposing values is different from changing values. Imposing values has the connotation of indoctrination, which is frowned upon in our democratic society (Krathwohl, Bloom and Masia, 1964). While changing values implies participation and selection of values by the individual. Changing a learner's attitudes and values is not usually viewed as a responsibility of an educator. However, if one believes that the major purpose of the teaching-learning process is to change the behaviors of learners, i.e., to do something (or do it differently) after the instruction is complete, then changing learners' attitudes is an acceptable and expected educational goal.

Another reason that is frequently given for not specifically addressing attitudes in a curriculum is because it is considered inappropriate to "grade" students with respect to their attitudes and values. Cognitive and skill achievement are considered "fair game for grading purposes" (Krathwohl, Bloom and Masia, 1964, p. 17), but achievement in the area of attitudes is not. This seems somewhat inconsistent with the philosophy of many educational institutions which profess to teach knowledge, attitudes, and skills. Educational institutions have traditionally been held accountable for the teaching of knowledge; recently society has applied pressure to educational institutions to teach more career-oriented skills. Institutions have responded with new types of educational programs.

Hesitancy to teach and evaluate attitudes also stems from the inadequacy of appropriate and objective appraisal techniques for the affective domain (Krathwohl, Bloom & Masia, 1964). The concern here is that students could possibly manipulate the teacher into thinking they had acquired certain affective learning outcomes when in fact they may not have.

On the other hand, educators often fail to realize that all human experiences have the potential for stimulating the development of attitudes.

People influence other people. By the very nature of the teacher-learner encounter, students learn attitudes whether the teacher plans for this to occur or not. Teachers need to become more sensitive to how a student's interactions with objects, ideas, events, people (especially the teacher in the classroom), and learning environment influence the development of attitudes.

One reason frequently given for teachers not specifically addressing the affective domain is because educators cannot control all the factors that influence a student's attitudes. The teacher's lack of ability to control all the factors that influence an individual's learning, however, is not limited to just the learning of attitudes, but is applicable to the cognitive and psychomotor domains of learning as well. A teacher cannot teach nor can a learner learn all there is to know in one field. Neither can a teacher teach all the skills nor a learner learn all the skills that are needed in one field, within the parameters of a formal educational program. With so much to be learned, the teacher needs to be selective about what is taught and how it is taught. This includes attitudes as well as knowledges and skills. Just as the teacher is one influencing factor in a student's development of knowledge and skills, she is also one influencing factor in a student's development of attitudes. This role of the teacher needs to be accepted and addressed in educational institutions.

How a teacher can influence the development of attitudes in students can be explained in terms of social learning theory, a relative newcomer to the area of learning theories.

Social learning theory assumes that behavior is a function of the interaction of a person and the environment and that this interaction accounts for any affective or cognitive learning that results. Unlike many other more popular learning theories, social learning theory assumes that both affective and cognitive behaviors can be learned simply by observing others, and that the type of learning that results from observations of others is not dependent upon reinforcement nor upon actual practice of that behavior. The theory is also based on the assumption that observations are "stored" in such a fashion that the observed learnings can be recalled at a later time when the conditions are favorable for utilizing the learnings. For example, if a student observed how a particular nurse handled a difficult patient, the theory suggests that the student would be able to imitate the nurse's behavior when encountering a similar situation even though he or she personally had not had the opportunity to practice the behavior. Using this theory of learning, the key to learning is the environment. Therefore the teacher's role would be primarily that of creating and managing learning environments that will result in the desired kinds of learning. This theory applies to the learning of knowledge, attitudes, and skills.

Creating An Environment For Affective Learning

Using social learning theory as a framework, the remainder of this paper will focus on how a teacher can create and manage the environment, particularly in the classroom, to enhance affective learning outcomes. The specific aspects of the classroom environment that will be discussed are: (1) the physical arrangement of the classroom; (2) student attention; (3) student involvement; (4) use of teaching materials, and (5) use of self in the classroom.[1]

Physical Arrangement Of The Classroom

One of the elements that the teacher needs to consider when creating an environment conducive to affective learning is the physical arrangement of the classroom. Although each different type of classroom arrangement offers disadvantages as well as advantages, there are some arrangements that are better for achieving affective outcomes than others. How changes in classroom arrangements and where the student sits in the class can affect a student's attitudes are discussed in a filmstrip produced by Resources for Education and Management entitled "Classroom Arrangements." (Demonstration of filmstrip segments.)

The best classroom arrangement is the one that lends itself to the class' achievement of objectives. Unfortunately, many times instructors find themselves in classrooms where it is not possible to rearrange the chairs. Under these conditions the teaching strategies will need to be modified to compensate for the limitations of the physical facilities.

Student Attention

A second factor to consider in creating a learning environment is how to get the student's attention. No matter how excellent the teacher may be, or how important the content, the teacher must capture the attention of the learner before he can receive the message. It comes as no surprise to anyone familiar with classroom instruction that only a very few students (usually those at the front of the room) pay attention all of the time and that most students (especially those at the back of the room) seem to pay attention only about half of the time, or less. Arousing attention is "... a much bigger problem than most educators realize..." (National Special Media Institute, p.23). In fact, some writers advocate that attention is more important than reinforcement or rewards in the educational environment. The teacher must get the student's attention or the student will not receive any of the instructor's message (National Special Media Institutes, 1972).

---

[1] Visual examples were used periodically to demonstrate the points presented. A list of the materials used is included in this presentation.

Asking questions, showing a film, doing a demonstration, or telling a joke are just some of the techniques that have been used by teachers to capture the attention of students. These techniques are usually welcomed by students who are tired of the more routine patterns of instruction. However, after a while, even these attention-getting strategies may become monotonous. Therefore, teachers need to continue to vary their teaching strategies and select experiences that will arouse and motivate students.

Student Involvement

Once a student's attention is aroused, it needs to be sustained. The key to keeping the student's attention is to get the student involved. Regardless of what teaching strategies are used, student involvement should be a part of every teaching strategy. Why involvement? Because learning, according to social learning theory, results from the person interacting with his environment. Any technique that requires the learners to generate a response will demonstrate to the learners that they are capable of acting without always being told what to do. This will help to develop self-concept and, as will be discussed later, is very important to developing attitudes and values.

How do you get involvement? One of the simplest methods is to ask questions, either of a specific individual or just anyone in the classroom. Another technique is to ask all class members to write their answers to a specific oral question and then share views on their answers. Small group activities are also excellent ways to involve everyone. Asking for reports from each group, or asking one group to critique another group's report, will also increase and sustain involvement. Another way is to ask students to actually do the teaching, or make reports of their own experiences. For some reason, students will listen more closely to a peer than the teacher, at least for a while. Individuals should not only participate in the learning experience, but they should also be able to defend the actions they took. For example, students should not only observe other people make decisions but, where possible, they should commit themselves to making a decision and then explaining why they made the choices they did. This technique is very effective in gaming, simulation and moral development learning situations, and results in heightened affective awareness.

At the university level where students have a choice of attending or not attending classes, motivating students to attend class may be a challenge. If the students expect that they will have to sit passively through another routine lecture, then motivation for attendance may be low. Getting students to come to class takes some ingenuity. Several techniques can be used here. A sneak preview of coming events, similar to the technique used to stimulate TV viewers to watch the next episode in a television series, can be used to motivate students to attend the next class meeting. Assigning students to prepare statements about their attitudes toward a controversial issue such as homosexuality, to take a position on a moral issue, to collect newspaper clippings on trends in medicine, to bring something to class that symbolizes a certain concept such as aging or death, or to identify a cultural habit that is specific for an ethnic group, are all teaching strategies that can be used to stimulate interest, increase student involvement, and have students come prepared for class.

It should be mentioned here that if the teacher makes assignments for students to prepare for a class, the teacher needs to be sure to capatalize on what students have done during the actual class time or else these types of assignments will quickly become known only as busy work.

Not only should teachers be enthusiastic during each class, but teachers should also try to build enthusiasm for a course as it progresses. Often, there is a tendency to let enthusiam for a course drop as it goes along. The teacher needs to be alert for this and do something about it as soon as it occurs. Remember, involvement is the key to successful teaching.

Use Of Teaching Materials

In this age of educational technology, teachers are becoming more aware of the role of media in the instructional process. Audiovisuals are being used more and more in the classroom for the purpose of conveying information, getting and holding students' attention, stimulating fantasy, encouraging participation, and making self-study easier. Audiovisuals have a way of getting a viewer's attention and thus involvement. In addition, well-designed audiovisuals can stimulate students to seek more information on the same topic on their own time. Since there is never enough time to cover everything of value in the instructional time allotted, this use of a student's free time can be very beneficial.

Although most audiovisuals are shown from beginning to end, this doesn't always need to be the case. If the pertinent part of the film occurs in a short middle segment, then show only that portion of the film and use the rest of the class time for something else. Another way to vary the use of an audiovisual, especially if it is a short film, is to show it twice--the first time with the sound, the second time without. When it is shown the second time, see if the students can recall the points made in narration. This will increase their involvement and will help reinforce learning.

Usually audiovisuals are produced from an objective standpoint, i.e., the viewer of the film sees the situation from the standpoint of an observer in the situation. One way in which audiovisuals can increase their appeal to the affective domain is to present the situation from a subjective viewpoint.

An example of a film that does this is one produced by Ethicon entitled "For the Patient's Sake." One segment of the film shows preparation for surgery from the objective viewpoint while the second part shows it from the subjective or patient's viewpoint. (Demonstration of film segments.) Although the patient in the second segment may have overacted, the point can still be made that films or slides from the subjective viewpoint lend themselves to greater affective outcomes than those shot from the purely objective standpoint. Films such as this help viewers break out of conventional modes of thinking about objects, experiences, or events.

Although audiovisual materials are frequently used by teachers to vary the teaching strategies within a given class, repeated use of the same or similar audiovisuals can become boring. Teachers need to be selective in the choice of AV materials to avoid the sense of sameness. Some films are designed to surprise, arose, shock or to make the viewer feel uncomfortable. One film that is particularly effective at stimulating affective outcomes is the "Prejudice Film" produced by Motivational Media.

The Use Of Self In The Classroom

An important, and often overlooked, component of the classroom environment is the teacher. How teachers present themselves in the classroom has tremendous influence on the learning atmosphere. Good teachers are more than just well informed about their subject matter. Rarely do teachers "fail because of the lack of knowledge" (Palardy, p. 40). Rather, they fail because they are not able to communicate their knowledge in a meaningful way. Effective communication in the classroom is not just the process of presenting information but rather encompasses the ability to hold and keep the learner's attention and to involve learners in the learning process (Palardy, 1975).

One way that teachers convey their beliefs and attitudes to students is in the way they handle students who cause problems in the classroom. Problem students are not unique to elementary or secondary teachers, but are also a concern of college and university teachers. Even though at the college level problem students only make up a very small part of any classroom, there are techniques that can be used for handling them. The filmstrip, "Handling Classroom Problems," which was produced by Resources for Education and Management Inc., discusses various aspects of the situation. (Demonstration of filmstrip segment.) The point made in this particular demonstration is that when teachers identify problem students, they should take a good look at their own classroom behavior and make sure the problems aren't ones they have created.

How teachers present and use themselves in the classroom also influences the academic performance of the learner. In fact, there is a direct relationship between the teacher's self-concept and success as a teacher (Palardy, 1975). The more positive teachers view themselves and others, the more likely they are to be successful in the classroom. If teachers believe students can achieve, the students are more likely to succeed. If teachers believe students cannot achieve, then failure is more likely.

The same holds for students. "Students who feel good about themselves and their abilities are the ones who are most likely to succeed. Conversely, "...(students) who see themselves and their abilities in a negative fashion usually fail to achieve good grades" (Purkey, p. 14). This holds true even after the individual's I.Q. is factored out. In fact, research on self-concept indicates that "The reported self-concept of ability was a better predictor of classroom achievement than I.Q., and that was true for both the Negro and Caucasian students" (Purkey, p. 24).

Recognizing that self-concept may be a better predictor or classroom success than I.Q., the teacher should attempt to help students gain positive and realistic images of themselves as learners in order to improve academic performance. How this might be accomplished is beyond the scope of this presentation, but certainly needs to be pursued if we are to be effective teachers both in the classroom and in the clinical area.

Teaching Strategies For The Affective Domain

Some teaching strategies which are particularly appropriate for developing affective learning outcomes are games and simulations, on the other hand, and moral development situations.

Games are competive encounters between individuals that may involve some degree of skill and/or luck. Games are played according to some defined rules and frequently use a playing board. Simulations, on the other hand, provide experiences in which one obtains the essence of something but without all the aspects of reality. Simulations allow individuals to experience vicariously what they may eventually experience in real life. The rules that govern a simulation situation are usually those which govern real life situations.

Values clarification is a process approach for dealing with values which people use when deciding what they are for or against, or where they are going and why. Values clarification strategies are used to help individuals recognize their values and to apply the valuing process to them. Moral development techniques focus on guiding moral dilemma discussions which enable students to grapple with two or more values that are in conflict. Such discussions can enhance moral growth.

Resources To Facilitate Affective Learning Outcomes

Assignment Game

Board game designed to teach motion economy while giving patient care. The objective is to carry out patient assignment in the least number of moves. Source: John Wiley & Sons, Inc., 605 Third Avenue, N.Y. 10016.

Ghetto

Game sensitizes players to the emotional, physical, political, and social context of poor people. Players are confronted face-to-face with pressures and economic forces that drive ghetto dwellers into crime and welfare. Source: Bobbs-Merrill Company, Inc., Education Division, 4300 West 62nd Street, Indianapolis, Indiana 46268.

I.Q. Drug Game

Simulates the decision-making process of a group who have to decide which applicants will be allowed to get a drug that will increase the I.Q. of their unborn child. Source: Simulation and Gaming Association, 4833 Greentree Road, Lebanon, Ohio 45036.

Tell-It-Like-It-Is

Board game that increases sensitivity to members of a group in terms of likes and dislikes. Individuals are expected to share thoughts, ideas and feelings with each other.

Lobbying Game

Action game that involves legislators and lobbyists in the passage/ defeat of bills. Prepares people to engage in the legislative process. Source: Gamed Simulations, Inc., P.O. Box 1747, New York, N.Y. 10022.

Mental Hospital

Participants role play and experience first hand the world of a psychiatric patient. Activities in the game increase the participant's awareness of the impact institutional procedures and staff behavior have on psychiatric patients. Source: Sandy Laszlo & Jan McKenzie, P.O. Box 6563, Columbus, Georgia 31907.

Life Passages: Personal Growth Beyond Adolescence

Multimedia kit which contains two filmstrips, a reunion game and a tour guide. Focus is on the inner changes adults (ages 18-45) experience as they grow and develop along predictable stages of development. Source: Louise Welsh Schrank, The Learning Seed Company, 145 Brentwood Drive, Palatine, Illinios 60017.

Nursing Process Simulations

Multimedia kits which are sub-units of a larger series on the nursing process. Sub-units include simulations in assessment, planning and implementation. Source: Harper & Row Publishers, Inc., 10 East 53rd Street, New York, N.Y. 10022.

Summary

In summary, affective learning is interrelated with cognitive learning. Affective learning always involves reactions or responses to a stimulus, which frequently is cognitive in nature. The affective domain has received little attention in schools of nursing despite the fact that practically all schools of nursing profess to teach attitudes as part of their philosophy. If nurse educators value affective learning, they need to begin to identify objectives, plan and select learning experiences to achieve these objectives, and develop and utilize evaluation techniques that are appropriate for the affective domain. There is much work to be done in this area. I challenge all educators to attend to the unmet needs of learners in the affective domain.

REFERENCES

Banks, James. Teaching Strategies for Ethnic Studies. Boston: Allyn and Bacon, Inc., 1975.

Harmin, Merrill; Kirshenbaum, Howard; and Simon, Sidney B. Clarifying Values Through Subject Matter. Minneapolis: Winston Press, Inc., 1973.

Horn, Robert. The Guide to Simulations/Games for Education and Training. Cranford, New Jersey: Didactic Systems. 1970.

Krathwohl, David R.; Bloom, Benjamin S.; and Masia, Bertram B. Taxonomy of Educational Objectives. The Classification of Educational Goals: Handbook II: Affective Domain. New York: David McKay Company, Inc., 1964.

Loree, Ray M. Psychology of Education. New York: The Ronald Press Company, 1970.

Mager, Robert F. Developing Attitudes Toward Learning. Palo Alto, California: Fearon Publishers, 1968.

National Special Media Institutes. The Affective Domain--A Resource Book for Media Specialists. Washington, D.C.: Gryphon House, 1972.

Palardy, Michael J. Teaching Today: Tasks and Challenges. New York: Macmillan Publishing Company, Inc., 1975.

Purkey, William. Inviting School Success. Belmont, California: Wadsworth Publishing Company, Inc., 1978.

Purkey, William W. Self-Concept and School Achievement. Englewood Cliffs. New Jersey: Prentice-Hall, Inc., 1970.

Reilly, Dorothy E. Teaching and Evaluating the Affective Domain in Nursing Programs. Thorofare, New Jersey: Charles B. Slack, Inc., 1978.

Simon, Sidney; Howe, Leland W.; and Kirshenbaum, Howard. Values Clarification: A Handbook of Practical Strategies for Teachers and Students. New York: Hart Publishing Company, Inc., 1972.

Thayer, Louis. Affective Education: Strategies for Experimental Learning. La Jolla, California: University Associates, Inc., 1976.

MORAL DEVELOPMENT OF NURSING STUDENTS: AN ISSUE CONFRONTING NURSING EDUCATION

Janet S. Awtrey
Associate Professor
School of Nursing
University of Alabama in Birmingham

INTRODUCTION

Nursing education is based on the previous educational and other life experiences of its students. Primary among these experiences are situations which involve the inculcation of values and the subsequent development of a hierarchy of values, or value system, by each individual.

Although Travelbee (1966) did not use the terms moral, moral development, or moral education, she suggested that nurses experience guilt when they realize that their responsibilities are not adequately fulfilled in nursing practice. Additionally, Steele and Harmon (1979) argued that nurses often find themselves in perplexing decision-making processes which surround complex ethical situations; however, nurses are often excluded from the major part of the decision-making process and are thrust directly into the position of converting the decision into action.

THE ISSUE UNDER EXPLORATION

There is little evidence that nursing education prepares the nurse to deal with moral issues arising in daily practice. A review of nursing literature over the past five years reveals a dearth of information dealing with moral education as a prerequisite for decision making (Levine, 1977).

A recent survey of 86 accredited baccalaureate programs showed that only six of these programs required a course which could be construed as moral education. However, two-thirds of the respondents said that there was integration of this subject throughout the curriculum (Aroskar, 1977). Moral decision making must be brought into the mainstream of nursing education and nursing practice since all nurses are involved in decision making in the moral domain. This involvement occurs regardless of the nurses' position descriptions or practice settings (Davis & Aroskar, 1978).

The challenge to nurse educators to promote students' moral development arises in part from the fact that general education has acknowledged the pertinence of moral education in curricula from elementary school throughout college. Furthermore, there has been a wide acceptance of cognitive-moral developmental theories in general education endeavors. These strides in the educational field present a problem for nursing education; nursing educators are being challenged to build on the previous moral decision-making skills of students and to embrace a methodology which will further their student's development. Questions posited by Gorovitz (1978) compound the issue. Who knows what decisions should be made? Who should make the decisions? Are the decisions the most morally adequate ones which could be made under the circumstances?

HISTORICAL ASPECTS OF MORAL EDUCATION

Concerns over morality and moral education are seemingly as old as mankind. In fact, morality has been a topic of philosophers as long as there has been philosophy (Wasserstrom, 1979). In fifth-century Athens, Meno asked his famous question of Socrates: "Can you tell me Socrates--is virtue something that can be taught? Or does it come by practice? Or is it neither teaching nor practice that gives it to a man but natural aptitude or something else?" Socrates answered, "You must think I am very fortunate to know how virtue is acquired. The fact is that far from knowing whether it can be taught, I have no idea what virtue is." (Plato, 1956, p. 115). A further concrete example of morality is found in The Holy Bible, Luke 10: 30-35, as Jesus relates the story of the Good Samaritan.

In 1892, Harris made a distinction between the old-fashioned school which regarded obedience to authority as the essential component and the new ideal which embraced the insight into the reasonableness of moral commands as the chief outcome. Harris further purported that the use of unreasoning obedience as a moral guide in school may in later life result in unreasoning obedience to a demagogue or to a leader in crime (Lickona, 1976). Durkheim in 1902 conveyed his extensive notions about morality, focusing on the salient characteristics of regularity of conduct and authority as aspects of discipline (Wilson, 1961). In 1932 Dewey presented his analysis of moral theory and the concepts of right, obligation, loyalty, moral judgment, moral knowledge, and the moral self.

Despite the continual writings about morality and moral development during the early 1900s, educators placed only a token attention on the concepts related to moral education. In fact, insidious focus on moral education was given the cliched title of "hidden curriculum" (Hall and Davis, 1975; Sapp, 1977).

A review of curriculum texts attests to the recent attention devoted to moral development. For example, Doll (1964), in Curriculum Improvement, made no reference to moral development while a later edition by the same author listed several pages devoted to this topic (1978). Early texts in the field of psychology made no mention of moral development or moral education (Clayton, 1965; Stroud, 1956) while a prototype psychology text in 1975 devoted a complete chapter to moral developemnt and moral reasoning (Brown & Herrnstein).

In 1971, Kuhmerker reviewed the literature regarding moral education and moral development. At that time there were approximately 500 entries concerning these areas. In the spring of 1976, Wallace reported no less than 1,800 citations of articles, books, and curriculum materials which were published between 1960 and mid-1975 in areas related to moral development and moral education.

A Gallup poll in the mid-1970s revealed that 84 percent of the parents with children in public schools favored instruction which deals with morals and moral behavior (Christenson, 1977). In 1977, Mantz, writing in a monthly lay magazine, prompted parents to answer the question, "What are your children being taught about morality?" (p. 16). In a similar vein, Muson (1979) served as an antagonist in questioning the use of Kohlberg's theory of cognitive-moral development in teaching moral thinking.

Kohlberg (1978) contended that moral education has been dead since the 1930s but is now experiencing a resurgence. The renewed interest is thought perhaps to be a result of a combination of factors. These situations include the unrest of the 1960s, the Vietnam war, the women's movement, attention to civil rights, the decline of traditional sexual morality, and the Watergate scandal. Despite these surface manifestations, Kohleberg proposed that the current interest in moral education has risen from the rediscovery of the moral principles behind the liberal faith and the recognition that these principles need to be entered into education.

Supporting Kohlberg's contention (1978) that moral education is once again in the forefront in education are the research findings of Leming (1979) and Lockwood (1978). Both of these authors provided evidence that moral reasoning of students can be advanced by open interchange, cognitive conflict, and exposure to higher stages of reasoning.

NURSING AND MORAL EDUCATION

Silva (1974) ventured that it is not yet apparent how nurses can prepare to cope with the difficult ethical conflicts arising today and those anticipated for the future. Krawczyk and Kudzma (1978) claimed that nurse educators should give immediate attention to moral education in nursing curricula to help students develop rational, autonomously chosen grounds for the decisions.

Despite nursing education's stated beliefs that man is a valuing being, little attention has been given to the way one comes to value, the formation of a value system, and the developmental process which accompanies decision making when choices must be made between two or more values which are in conflict. Only a few articles were written in the late 1970s addressing moral/ethical problems and the concomitant decisions made by nurses (Aroskar, 1977; Bindler, 1977; Johnson, 1977; Krawczyk and Kudzma, 1978; Levine, 1977; Romanell, 1977; Ryden, 1978). In 1979, Wolf and O'Driscoll proclaimed that the preclinical conference can serve as a method for dealing with many topics--among these moral issues. However, the authors failed to elaborate on the teaching strategies necessary for accomplishing such an awesome task.

A review of texts in the area of nursing revealed only three sources which dealt specifically with moral/ethical/values issues (Davis and Aroskar, 1978; Roy, 1976; Steel and Harmon, 1979). Many nursing texts refer to values but do not address themselves to moral development as it affects the client, nursing practice, or the nursing profession.

Although emphasis on moral education in nursing seems to be belated when compared with other fields in education, the interest shown in recent years attests to the recognition that, of necessity, it must include moral education throughout its curricula. The next step apparently hinges on the methodology by which such a task can be accomplished.

THEORETICAL FRAMEWORKS SUPPORTING MORAL DEVELOPMENT

The initial theories related to moral development were in the realm of social learning and included psychoanalytical and learning theories. In the early 1900s, Freud and Durkheim proposed that the internalization of socially sanctioned prohibitions and mandates affected moral standards. Although the societal norms are initially alien to the individual, they are eventually adopted through the efforts of parents who serve as early socializers. With the passage of time, the external control is replaced by internal control (Aronfreed, 1976; Hoffman, 1970).

Other social theorists refute the beliefs of Freud and Durkheim and contend that the moral standards of an individual are highly vulnerable to internal and external pressures. Because of these pressures, the individual's moral standards must be maintained by a continuing pattern of social reinforcement and support. In 1966, Reiss argued that moral standards result from institutionally organized systems rather than from parent-child relationships. Since Reiss and Durkheim both concluded that internalized standards account for moral behavior, recognition must be given to the fact that a multiplicity of influences can inpinge upon the internalization of new norms (Hoffman, 1970).

The later theories of moral development were postulated as the cognitive-developmental approach to moral ideology. This approach involves the analysis of thought structure which underlies the moral concepts of persons at different age levels. A general direction of movement is identified. The thought structure is designated by stages which are further defined as being an integrated whole, following an invariant sequence, and maintaining a hierarchical pattern (Kohlberg, 1975; Piaget, 1948).

In 1948, Piaget expressed his views of moral development. He proposed that moral development is an active process which involves certain cognitive capacities concomitant with both maturation and life experiences. As the child develops cognitively, he is able to understand new experiences and integrate them into his previous viewpoints. The result of this struggle is a new and higher level of moral orientation whereby the child moves from moral realism to autonomy. Movement may be stopped or reversed depending on circumstances which interfere with mutual and reciprocal social interaction. According to Piaget (1948), a cognitive-developmental approach is confined to stimulating and challenging the individual to reorganize his previous patterns of moral thought. This approach differs distinctly from the social learning theories in that social learning theorists regard the social environment as having a direct molding role which supplies the child with ready-made standards. These standards are incorporated into pre-existing structures rather than forming new structures as proposed by the cognitive-developmental theorists (Hoffman, 1970).

Using the works of Piaget and Dewey, Kohlberg (1975) began over 20 years ago to redefine and validate the concept of stages of moral development. He elaborated on Piaget's definition of stages and proposed that stages are structured wholes or organized systems of thoughts; that stages form an invariant sequence in which movement is always forward and never backwards; and that stages are hierarchical integrations in which there is a tendency to function at or prefer the highest stage available. Kohlberg identified six stages of moral development and gave the description or social perspective characteristic of each of the stages. This description is essential in determining the specific stage of moral development of an individual. The six stages are assigned to three levels--the preconventional, conventional, and postconventional. Each level contains two of the identified stages and provides a framework for categorization of general thought processes of an individual.

A major premise of the cognitive-moral development view held by Kohlberg is that the cognitive and affective structures develop naturally from the interaction between a child and his environment. As a result of experience and maturation, the individual moves through a developmental sequence of stages that represents transformations of earlier cognitive structures (Kohlberg, 1966).

36

Kohlberg's theory is based in part on the following claims: (a) universality of stages exists, therefore the moral reasoning of all societies can be adequately conceptualized in the identified stages; (b) in order to move from one stage to the next, the individual must be presented with moral dilemmas which force him to arrive at solutions; (c) as the individual strives for new solutions to resolve his conflicts, he develops a more sophisticated, higher level of reasoning; and (d) moral development adheres closely to the level of cognitive development (Sapp, 1977).

USE OF ROLE THEORY IN IMPLEMENTING MORAL EDUCATION

Hardy and Conway (1978) included many aspects of role theory which can be essential in implementing moral education throughout nursing curricula. Hurley (1978) specified that moral development is an integral part of socialization. Socialization, when viewed as an interactive process, coincides closely with Kohlberg's interactionist approach (1975) to moral development. Furthermore, there is consistency between the two tenets of interaction in that the socializee must be an active participant if personal development is to occur.

Conway (1978b) succinctly accepted the interactionist perspective by positing that the individual selects certain cues for action, which, for him, has more relevance than other actions. This belief was supported in moral education by Steele and Harmon (1979). Hurley (1978) spoke of the process of socialization. Role-taking was identified as a prerequisite to the learning of roles. Kohlberg's theory (1975) focused on the ability to take another's role as the essential criterion for moral development. In the development of self, an individual must be provided opportunities and guided in role-taking.

Hurley (1978) acknowledged that, although there is a difference between childhood and adult socialization, socialization still occurs in adulthood. This perspective is essential in recognizing that moral education for adults can assist in continuing development in the moral domain. Hurley further recognized that peer groups (or reference groups) have an impact on socialization. Moral discussions, which are conducted in group settings, depend on the group process as a vehicle for promoting moral development (Blatt, 1975).

Hardy (1978) contended that role strain frequently results from role stress; however, she cautioned that generalizations must be made cautiously when referring to the cause-effect relationship. Despite the fact that Hardy did not delineate that some role stress may actually facilitate role functioning, she implied that role stress may cause an individual to manipulate his role structure in order to manage the stress. This is the same principle posed by Kohlberg (1975) and Piaget (1948) when they speak of disequilibrium or discontent as a motive for moral development. In a sense, stress is an essential component of development of socialization.

Conway (1978a) referred to the goals and decision-making processes common to organizations. She referred to Vroom's expectancy theory which seems consistent with the reward-punishment stage of moral development as described by Kohlberg (1975). The equity theory strongly suggest an interpersonal concordance orientation as described by Kohlberg. The similarity among these theories attest to the need for educators to understand the assumptions underlying the theories and to carefully examine the tenets as they relate to the development of students.

Lum (1978) distinguished among normative groups, comparison groups, and audience groups. This distinction is essential when planning moral education. Since an audience group provides for no reciprocal activities on the part of the individual, this type group could be perceived as detrimental to moral development activities.

Kohlberg's contention that autonomy is characteristic of the post-conventional stage of moral development (1975) coincides with Conway's (1978a) implication that autonomy is a professional attribute. A discrepancy exists, however, when Conway stipulates that autonomy for an individual is restricted by his social and professional milieu. Despite the realism of her statement, moral education would attempt to raise an individual above these constraints by developing a reasoning system for the individual which is based on moral principles rather than rules of an organization. This situation may initially create difficulties in the organization, but it is more unlikely that bureaucratic goal displacement would occur if decisions affecting people were based on moral principles rather than power, economics, or convenience.

An analysis of role theory and cognitive-moral development theory would reveal many similarities. In initiating an inclusion of moral education in nursing curricula, it appears imperative that both theories guide the activities related to fostering moral development.

39

RESOLUTION OF THE ISSUE: MORAL EDUCATION IN NURSING CURRICULA

All persons are regarded as having values, and moral persons are expected to act on their values. The difficulty arises, however, when a situation occurs in which two or more values are in conflict. The contradictory views based on different values create a moral issue or moral dilemma. A resolution to the dilemma requires moral reasoning or decision making, as one value is given precedence over the other (Hersh, Paolitto, and Reimer, 1979).

In the cognitive-moral development approach, Kohlberg (1975) postulated that as an individual is faced with a moral dilemma and develops the structure for his moral reasoning, he is enabled in advancing to the next stage which provides better justification for his decision than was expressed at the lower stage. As conflict situations or moral dilemmas continue to arise, the individual begins to become discontent with lower stages of reasoning and seeks a higher level of reasoning. This seeking process results in judgments which produce resolution more effectively (Galbraith and Jones, 1976; Husted and Fenton, 1976; Ladenberg, 1978).

Galbraith and Jones (1976) contended that persons who regularly participate in moral discussions often begin to articulate reasoning at higher stages of development. Such discussions, which focus on the reason for suggesting a particular course of action, promote maturity in the nature of moral reasoning for many of the participants.

According to Steele and Harmon (1979), nurses can benefit by discussing moral dilemmas in groups which are composed of individuals at various stages of moral development. A moral discussion which centers on at least two conflicting values involving respect for persons is a tested way of promoting moral development (Blatt and Kohlberg, 1975).

Prior to including moral education as a integral part of the nursing curriculum, nurse educators would require study of cognitive-moral development theories and the techniques suggested for promoting moral growth. This continuing education endeavor for nurse faculty could easily be adapted from the materials prepared by Guidance Associates (1976). Upon completion of the continuing education program, faculty should be able to recognize moral issues when they arise in classroom or clinical activities, develop hypothetical moral dilemmas to promote discussion of selected values, and conduct moral discussions according to specified guidelines. When faculty members have achieved these abilities and embrace a philosophy which encompasses the value of moral education for the nursing profession, the natural movement would be for nursing educators to recognize opportunities for implementing moral education throughout the nursing curriculum.

Several steps are essential for the implementation of developmental moral education (Hersh, Paolitto, and Reimer, 1979). These steps include: understanding the nature of moral conflict from a developmental viewpoint; understanding the elements for promoting moral growth; developing appropriate questioning strategies; developing an awareness of moral issues; creating a facilitative atmosphere in the classroom; anticipating the difficulties arising when leading moral discussions; and experiencing personal cognitive conflict as the teacher who engages in moral education activities.

The following schema is posited as a solution to the issue that moral education rarely appears in present-day nursing curricula despite the fact that there is a resurgence of interest in moral development.

A Model For Nursing Education In The Moral Domain

Moral Education For Faculty (Theories And Techniques)
School Philosophy Encompassing Moral Education
Curricular Inclusion Of Moral Education
Effective Moral Decision Making
Improvement In Quality Of Nursing Care
Improvement And Progression Of The Nursing Profession

Each step in the depicted schema is presented as hierarchical and invariant. For example, there may be some question about entertaining a notion of moral education for faculty prior to development of a school philosophy which addresses moral education. Upon analysis it seems only reasonable that faculty members cannot embrace a philosophy of moral education until they gain an understanding of moral education and moral development. Furthermore, the schema provides for inclusion of moral education throughout the curriculum rather than as a single course bearing a label of "Moral Education." Galbraith and Jones (1976) contended that it is the repeated confronting and reasoning about moral issues which results in moral growth.

LEVELS AND STAGES OF MORAL DEVELOPMENT*

The Preconventional Level (Stages 1 and 2)

At this level, the power of authority figures or the physical or hedonistic consequences of actions, such as punishment, reward, or exchange of favors, determine moral judgment. The level has the following two stages:

Stage 1: The Punishment and Obedience Orientation

At this stage, the physical consequences of doing something determine whether it is good or bad. People at Stage 1 think about avoiding punishment or earning rewards, and they defer to authority figures with power over them.

Stage 2: The Instrumental Relativist Orientation

At Stage 2, moral judgment leads to action that satisfies one's own needs and sometimes meets the needs of others. Thought at Stage 2 often involves elements of fairness, but always for pragmatic reasons rather than from a sense of justice or loyalty. Reciprocity, a key element in Stage 2 thought, is a matter of "you scratch my back and I'll scratch yours."

The Conventional Level (Stages 3 and 4)

People at this value level maintain the expectations of their family, group, or nation for their own sake and regardless of immediate consequences. People at the conventional level show loyalty to the social order and actively maintain, support, and justify it. This level has the following two stages:

Stage 3: The Interpersonal Sharing Orientation

At this stage, people equate good behavior with whatever pleases or helps others and with what others approve of.

---

*TEACHER TRAINING IN VALUES EDUCATION: A WORKSHOP
Copyright 1976 by Guidance Associates
All rights reserved.

Permission is hereby granted to reproduce this worksheet only in connection with this program, provided the copyright notice above is also reproduced.

Stage 3 people often conform to stereotypical ideas of how the majority of people in their group behave. They often judge behavior by intentions, and they earn approval by being "nice."

Stage 4: The Societal Maintenance Orientation
Stage 4 thought orients toward authority, fixed rules, and the maintenance of the social order. Right behavior consists of doing one's duty, showing respect for authority, or maintaining the given social order for its own sake.

The Principled Level (Stages 5 and 6)

At this level, people reason according to moral principles which have validity apart from the authority of the groups to which the individuals belong. This level has the following two stages:

Stage 5: The Social Contract, Human Rights, and Welfare Orientation
People at Stage 5 tend to define right action in terms of general individual rights and standards which have been examined critically and agreed upon by the society in a document, such as the Declaration of Independence, rather than accepting authority unquestioningly as in Stage 4. Stage 5 thinkers stress the legal point of view, but they emphasize the possibility of changing laws after rational consideration of the welfare of the society. Free agreement and contract bind people together where no laws apply.

Stage 6: The Universal Ethical Principle Orientation
At Stage 6, people define the right by the decision of their conscience guided by ethical principles, such as respect for human personality, liberty compatible with the equal liberty of all others, justice, and equality. These principles appeal to logical comprehensiveness, universality, and consistency. Instead of being concrete rules, they are abstract ethical principles.

SUMMARY

There is little evidence that nursing education is preparing nurses to effectively make decisions within the moral domain. Specifically, moral education, although experiencing a resurgence in interest in other fields, is excluded from nursing curricula. Although, there is a lack of available moral education materials which have been adapted for use in nursing education, efforts should be made to develop methods for incorporating moral education throughout the nursing curricula.

REFERENCES

Aronfreed, J. "Moral Development from the Standpoint of a General Psychological Theory." Moral Development and Behavior: Theory, Research, and Social Issue. Edited by T. Lickona. New York: Holt, Rinehart, and Winston, 1976.

Aroskar, M. A "Ethics in the Nursing Curriculum." Nursing Outlook 24 (1977): 260-264.

Bindler, R. "Moral Development in Nursing Education." Image 9 (1977): 19-20.

Blatt, M., and Kohlbert, L. "The Effects of Classroom Moral Discussion Upon Children's Level of Moral Judgment." Journal of Moral Education 4 (1975): 129-161.

Brown, R., and Herrnstein, R. J. Psychology. Boston: Little, Brown, and Company, 1975.

Christenson, R. M. "McGuffey's Ghost and Moral Education Theory Today." Phi Delta Kappan 58 (June 1977): 737-742.

Clayton, T. E. Teaching and Learning: A Psychological Perspective. New Jersey: Prentice-Hall, Inc., 1965.

Conway, M. E. "Organizations, Professional Autonomy, and Roles." Role Theory: Perspectives for Health Professionals. Edited by M. E. Hardy and M. E. Conway. New York: Appleton-Century-Crofts, 1978. (a)

Conway, M. E. "Theoretical Approaches to the Study of Roles." Role Theory: Perspectives for Health Professionals. Edited by M. E. Hardy and M. Conway. New York: Appleton-Century-Crofts, 1978. (b)

Davis, A. J., and Aroskar, M. A. Moral Dilemmas and Nursing Practice. New York: Appleton-Century-Crofts, 1978.

Dewey, J. Theory of Moral Life. New York: Holt, Rinehart, and Winston, 1960.

Doll, R. C. Curriculum Improvement: Decision-Making and Process. 2nd ed. Boston: Allyn and Bacon, Inc., 1964.

Doll, R. C. Curriculum Improvement: Decision-Making and Process 4th ed. Boston: Allyn and Bacon, Inc., 1978.

Galbraith, R. E., and Jones, T. M. Moral Reasoning: A Teaching Handbook for Adapting Kohlbert to the Classroom. Saint Paul, Minnesota: Greenhaven Press, Inc., 1976.

Gorovitz, S. "Ethical Dilemmas in Medicine: Who Should Decide?" The Phi Kappa Phi Journal (1978) 3-8.

Hall, R. T., and Davis, J. U. Moral Education in Theory and Practice. New York: Prometheus Books, 1975.

Hardy, M. E. "Role Stress and Role Strain." Role Theory: Perspectives for Health Professionals. Edited by M. E. Hardy and M. E. Conway. New York: Appleton-Century-Crofts, 1978.

Hardy, M. E., and Conway, M. E. Role Theory: Perspectives for Health Professionals. New York: Appleton-Century-Crofts, 1978.

Hersh, R. H., Paolitto, D. P., and Reimer, J. Promoting Moral Growth. New York: Longman, 1979.

Hoffman, M. L. "Moral Development." Carmichael's Manual of Child Psychology, Vol. II. Edited by P. H. Mussen. New York: John Wiley and Sons, Inc., 1970.

Hurley, B. A. "Socialization for Roles." Role Theory: Perspectives for Health Professionals. Edited by M. E. Hardy and M. E. Conway. New York: Appleton-Century-Crofts, 1978.

Husted, S. D. R., and Fenton, E. "Understanding Stages Two Through Four on the Kohlbert Scale." Teacher's Guidance Associates, 1976.

Johnson, P. "The Gray Areas--Who Decides?" American Journal of Nursing 77 (1977): 856-858.

Kohlbert, L. "Cognitive Stages and Preschool Education." Human Development 9 (1966): 5-17.

Kohlbert, L. "The Cognitive-Developmental Approach to Moral Education." Phi Delta Kappan (1975): 670-677.

Kohlbert, L. F. "Readings in Moral Education." Edited by P. Scharf. Minneapolis: Winston Press, Inc., 1978.

Krawczyk, R., and Kudzman, E. "Ethics: A Matter of Moral Development." Nursing Outlook 26 (1978): 254-357.

Kuhmerker, L. A Bibliography on Moral Development and the Learning of Values in Schools and Other Social Settings. New York: The New York Society For Ethical Culture, 1971.

Ladenberg, T. J. "Cognitive Development and the Teaching of Social Studies." Readings in Moral Education. Edited by P. Scharf. Minneapolis: Winston Press, Inc., 1978.

Leming, J. S. "Teaching Values: Practical Applications of Research." 1 (1979): 3.

Levine, M. E. "Nursing Ethics and the Ethical Nurse." American Journal of Nursing 77 (1977): 845-849.

Lickona, T. Moral Development and Behavior: Theory, Research, and Social Issues. New York: Holt, Rinehart, and Winston, 1976.

Lockwood, A. A. "The Effects of Values Clarification and Moral Development Curricula on School Age Subjects: A Critical Review of Recent Research." Review of Educational Research 48 (1978): 325-364.

Lum, J. L. J. "Reference Groups and Professional Socialization." Role Theory Perspectives for Health Professionals. Edited by M. E. Hardy and M. E. Conway. New York: Appleton-Century-Crofts, 1978.

Mantz, B. "What are Your Children Being Taught About Morality?" Better Homes and Gardens (September 1978): 16-26.

Muson, H. M. "Moral Thinking: Can it be Taught?" Psychology Today 12 (1975): 286-291.

Melson, T. W. "What is or Should be Moral Teaching?" Theory Into Practice 14 (1975): 286-291.

Piaget, J. The Moral Judgment of the Child. New York: The Free Press, 1965.

Plato, Protagoras and Meno. Great Britain: Penguin Books Ltd., 1956.

Romanell, P. "Ethics, Moral Conflicts, and Choice." American Journal of Nursing 77 (1977): 850-855.

Roy, C. Introduction to Nursing: An Adaptation Model. New Jersey: Prentice-Hall, Inc., 1976.

Ryden, M. "An Approach to Ethical Decision Making." Nursing Outlook 23 (1978): 705-706.

Sapp, G. "The Principle of Justice in the University." Potluc Forum 4 (1977): 5-6.

Silva, M. C. "Science, Ethics, and Nursing." American Journal of Nursing 74 (1974): 2004-2007.

Steel, S. M., and Harmon, V. M. Values Clarification in Nursing. New York: Appleton-Century-Crofts, 1979.

Stroud, J. B. Psychology in Education. New York: Longsman, Green, and Company, 1956.

Teacher Training in Values Education: A Workshop. New York: Guidance Associates, 1976.

Travelbee, J. Interpersonal Aspects of Nursing. Philadelphia: F. A. Davis, 1966.

Wallace, J. E., ed. A Bibliography on Moral/Values Education. Philadelphia: Research for Better Schools, Inc., 1976.

Wasserstrom, R. A. Today's Moral Problems. New York: Macmillan Publishing Company, 1979.

Wilson, E. K., ed. Moral Education: A Study in the Theory and Application of the Sociology of Education. New York: The Free Press, 1961.

Wolf, Z. R., and O'Driscoll, R. W. "How Useful is the Preclinical Conference?" Nursing Outlook 27 (1979): 455-457.

Note: The film, "Moral Development" (Released 1973) can be obtained from CRM films, 110 Fifteenth Street, Del Mar, California 92014, (714-453-5000).

HANDOUT[1]

MORAL DILEMMA RELATED TO HEALTH CARE

ISSUES IN CONFLICT: AFFILIATION, OBLIGATION, AND CONSCIENCE

CENTRAL CHARACTERS: MARY AND JUNE, SISTERS

Mary and June are sisters who are registered nurses. They graduated a year ago from nursing school, and both work on the same clinical unit although on different shifts. Mary confides to June that she took a verbal order from a physician in which she understood him to say "Morphine 15 mg." Mary gave the morphine without questioning the order. The patient receiving the medication was a 90-year-old, debilitated, dehydrated man who had been complaining of headaches. The patient was found dead within eight hours after the injection. Mary had written on the chart "Slept well all night." The patient's death was attributed to a CVA because of his age and his headaches. In her fear Mary covered up the medication error by writing a codeine order on the chart and substituting names on the narcotics record.

Mary knows the cause of the elderly man's death and feels that she can trust June with the information. She knows that her mind will be greatly relieved if she can confide in her sister. Because of her frequent nightmares, Mary tells June the whole story after obtaining a promise from June that the information will be confidential.

---

[1] Distributed by Janet Awtrey, Associate Professor of Nursing, University of Alabama in Birmingham School of Nursing, during the Third Regional Conference of the Faculty Development in Nursing Education Project, October 15-16, 1979.

A week passes and the Director of Nursing calls together all the nurses on the unit where Mary and June work. She states that there was sufficient evidence that the narcotics record had been altered in the past few weeks and that all the nurses on that unit would be placed on probation with notation of such in their permanent files unless she learned the truth from the nurses themselves.

Should June keep Mary's situation confidential? Why or why not?

Probe Questions for Moral Dilemma Related to Health Care:

Is it ever right to break a promise? Why or why not?

Does one mistake deserve punishment for the offender? Why or why not?

Which is more important -- keeping a promise or keeping a professional obligation? Why?

Should June have made the same decision if the patient had not died? Why or why not?

Should June have made the same decision if the patient had been a child? Why or why not?

Should June have made the same decision if Mary weren't her sister? Why or why not?

To Complicate the Dilemma:

The Director of Nursing finds out about the mistake and Mary is reported to the Board of Nursing.

Should the Board revoke Mary's license? Why or why not?

Additional Probe Questions:

Is law more important than a young person's future? Why or why not?

Is it ever right to break a law? Why not or under what circumstances?

To whom does the Board have a responsibility in this situation? Why?

Does one error constitute incompetence or non-professional conduct? Why or why not?

Developed by Janet S. Awtrey, University of Alabama School of Nursing, University of Alabama in Birmingham.

HANDOUT[1]

CHARACTERISTICS AND GOALS OF MORAL DISCUSSIONS

Good moral discussions have four major characteristics.

1. **A moral discussion is open-ended.** The conversation centers on the reasoning used to justify recommended action on the issue involved in a dilemma, rather than on the action itself. Hence there are no right or wrong answers. The discussion focuses on why the protagonist should or should not act in a certain way. There is no attempt to reach agreement on a solution to the dilemma.

2. **A nonthreatening classroom atmosphere is a basic prerequisite for a moral discussion.** Because the discussion stresses reasoning, students need to feel completely free to express their opinions without fear of embarrassment or disapproval. Seating should be informal with chairs arranged in a circle to make conversation comfortable and easy.

3. **Students talk mainly to one another.** This is in contrast to traditional class discussions where much of the conversation consists of interchanges between the teacher and individual students. In moral discussions, students question and challenge one another's reasoning, and the teacher intervenes where necessary to keep the discussion focused on the dilemma.

4. **A moral discussion exposes students to moral reasoning at different stages of the Kohlberg scale in two specific ways.** The teacher encourages those students who reason at stages that are next to each other on the scale to challenge one another's arguments. In addition, the teacher guides the discussion through the use of appropriate questions that stimulate moral reasoning.

Moral discussions can help students progress toward at least five sets of goals or objectives: **(1) developing listening and discussion skills;**

---

[1] Distributed by Janet Awtrey, Associate Professor of Nursing, University of Alabama in Birmingham School of Nursing, during the Third Regional Conference of the Faculty Development in Nursing Education Project, October 15-16, 1979.

(2) developing self-esteem and self-knowledge; (3) developing positive attitudes toward school; (4) developing moral reasoning; and (5) developing knowledge of important concepts.

1. Listening and discussion skills become very important as students question and challenge each other's arguments. The continuous student interactions in a moral discussion demonstrate to students the need to listen carefully to one another as well as to the teacher and to express their own ideas clearly. Moral discussions provide a comfortable and appropriate setting for the development and improvement of these skills.

2. Because moral discussion elicits students' opinions in an atmosphere of acceptance and respect, every student can contribute constructively. The format of the discussions implicitly tells students that their ideas have merit and that the teacher recognizes this. Self-esteem grows when students feel that the teacher and other students listen to them and value their comments. And self-knowledge develops as students examine their own ideas and their reasoning about basic moral issues.

3. Most students enjoy moral discussions. They find the dilemmas interesting, and they feel that their contributions are important. In addition, students often find that considering social studies materials in a moral dilemma framework makes course content more relevant to their own lives. For example, discussing historical dilemmas can build interest in history courses because students begin to realize that people in the past faced the same sorts of problems as they themselves face today. Increased interest in and enjoyment of class discussion encourages the development of positive attitudes toward school.

4. The research of Kohlberg and his colleagues indicates that the development of moral reasoning in the form of stage change occurs very slowly as a result of repeat exposure to higher-stage reasoning. When moral discussions are properly conducted, they provide such exposure for students. Thus, moral discussions that form an integral part of the curriculum over a period of several years offer a fruitful means of achieving the objectives of cognitive-moral development.

5. Moral discussions often involve basic concepts that students define in stage-related terms. The following example illustrates definitions of justice at five stages on the Kohlberg scale.

Stage 1: Justice is getting rewarded for something I do.
Stage 2: Justice means that you will do something for me later if I help you now.
Stage 3: Justice means doing what all the people in the group approve of.
Stage 4: Justice is when everyone follows the rules on which we have agreed.
Stage 5: Justice means that people get their basic rights.

Moral discussions expose students who reason at lower stages to the more adequate definitions of the concepts that accompany higher-stage reasoning. Such exposure facilitates development of knowledge of important concepts.

Permission is hereby granted to reproduce this worksheet only in connection with this program, provided the copyright notice below is also reproduced.

TEACHER TRAINING IN VALUES EDUCATION: A WORKSHOP
Copyright 1976 by Guidance Associates
All rights reserved.

THE SOCIALIZATION SEMINAR

LaRetta M. Garland
Professor
Nell Hodgson Woodruff School of Nursing
Emory University

The overt examination of attitudes, values and beliefs is beginning to assume a higher priority in programs of nursing education. Beliefs in the unique value of the individual are inherent in the curricular philosophies, stated objectives, theoretical content, and in descriptions of clinical learning selections. However, it is often difficult to identify the areas of learning in which the expression of attitudes, values, and beliefs is encouraged, examined, and modified in the socialization of students into the nursing role.

The development and testing of a model for the socialization of students into the role of the professional nurse have been viable endeavors of the faculty of the undergraduate program at the Nell Hodgson Woodruff School of Nursing at Emory University for several years. This model uses the seminar format, composed of small groups with faculty leadership, to facilitate the professional role socialization. This socialization includes: (1) the acquisition of group process skills, (2) provisions for sharing concerns (education and personal), (3) the development or modification of attitudes, values and beliefs, and (4) activities related to the examination of a series of topics which enlarge the content supporting the learning and practice of professional nursing. Topics include overviews of the evolution of nursing, the criteria of a profession, the major position papers in nursing and their impact, confidentiality, ethical and legal responsibilities, exposures to controversial issues and political processes, the emergence of supportive nursing organizations, and the development of different nurse-practice roles. These topics are mutually selected by faculty and students for their contributions to professional role socialization and, occasionally, are initiated at particular seminar large group sessions by "stimulus speakers," that is, a faculty member or invited speaker with special interest and achievements in a given area.

The two-hour seminars are conducted weekly throughout the upper division of nursing (except during the Practicum in Role Orientation experience) with the educational focus emanating from stated objectives. The small groups in the seminars are distinctive in that each group and its leader have personalized concerns for consideration and choices of ways to deal with topics. In addition, small groups have individualized goals and contracts to be achieved within the confines of the overall seminar expectations. Eventually, most small group members use the small groups as components of their support systems while in the School of Nursing.

As the faculty observe the responses to the activities of the small groups, the changed behavior over time includes the aforementioned heightened self-awareness and broadened perception in individual members as well as in the small groups. Individual members increase their sharing and responding behaviors, abilities to risk reactions to their feelings and thoughts, and begin to modify and/or accept their behavior and the behavior of others. The acquisition and use of group skills, including processing of group responses, facilitate the recognition of group and individual behavior in the sessions and awareness of responsibilities for their actions. For example, members are encouraged to solve problems related to their concerns and assume responsibility for their actions. Forms of feedback include: (1) an individually maintained confidential "reaction" journal for faculty and student sharing of experiences and reflections and (2) self-evaluation procedures (individual and group) at the end of each quarter.

These small groups, in facilitating the development of effective interactional skills, an increase in self-awareness, a broadening of perceptions, and the development and modification of beliefs, attitudes, and values, may promote mental health far beyond the initial objectives for socialization into the study and practice of nursing.

HANDOUT[1]

DEFINITION OF PROFESSION

"A profession is a vocation whose practice is founded upon understanding of the theoretical structure of some department of learning of science, and upon the abilities accompanying such understanding. This understanding and these abilities are applied to the vital practical affairs of man. The practices of the profession are modified by knowledge of a generalized nature and by the accumulated wisdom and experience of mankind which serve to correct the errors of specialism. The profession serving the vital needs of man considers its first ethical imperative to be altruistic service to the client."[2]

Professionalization - Some Definitions[3]

"Profession" - applied only to an abstract model of occupational organization.

"Professionalization" - a concept - used to refer to the dynamic process whereby an occupation can be observed to change certain crucial characteristics which have been identified as critical of professionalization.

---

[1] Distributed by LaRetta Garland, Professor, School of Nursing, Emory University, during the Third Regional Conference of the Faculty Development in Nursing Education Project, October 15-16, 1979.

[2] Morris L. Cogan, "Toward A Definition of Profession," Harvard Educational Review, 23 (Winter, 1953), 33-50.

[3] Howard M. Vollner and Donald L. Mills, Professionalization (Englewood Cliffs, N.J.: Prentice Hall, Inc., 1966), p. 49.

"Professionalism" is used to refer to an ideology and associated activities that can be found in many occupational groups where members aspire to professional status.

"Professional Groups" is used to refer to associations of colleagues in an occupational context where a high degree of professionalization has taken place.

"Professionals" are those considered by their colleagues to be members of professional groups.

The term "profession" is used to mean an ideal type of occupational organization which does not exist in reality but which provides the model of the form of occupational organization that would result if any occupational group became professionalized.

"We avoid discussion of whether any occupation is 'really a profession' ask 'how professionalized' or 'how professionalized in certain identifiable respects' a given occupation may be at some point in time."

Four Essential Attributes (or Measures) - A Scale of Professionalism

Barber[4] states that professional behavior may be defined in terms of four essential attributes. He states further that these four essential attributes define a scale of professionalism, a way of measuring the extent to which it is present in different forms of occupational performance. The most professional behavior would be that which realizes all four attributes in the fullest possible manner.

1. A high degree of generalized and systematic knowledge.
2. Primary orientation to the community interest rather than to individual self-interest.
3. A high degree of self-control to behavior through codes of ethics internalized in the process of work socialization and through voluntary association organized and operated by the work specialists themselves.
4. A system of rewards (monetary and honorary) that is primarily a set of symbols of work achievement and thus ends in themselves.

---

[4] Bernard Barber, Some Problems in the Sociology of the Professions, the Professions in America (Boston: Beacon Press, 1963), p. 15-34.

Essential Elements in the Ideal-Type Profession

1. A bases of systematic theory.
2. Authority recognized by the clientele of the professional group.
3. Broader community sanction and approval of this authority.
4. A code of ethics regulating relations of professional persons with clients and with colleagues.
5. A professional culture sustained by formal professional associates.

Greenwood[5] suggests that this model of a profession can provide criteria for evaluation of the degree to which an occupation has become professionalized.

---

[5] Ernest Greenwood, The Elements of Professionalization (Englewood Cliffs, N.J.: Prentice Hall, Inc., 1966), p. 10-19.

HANDOUT[1]

MEMBER ROLES IN GROUPS ATTEMPTING TO IDENTIFY, SELECT, AND SOLVE COMMON PROBLEMS

GROUP TASK ROLES. Facilitation And Coordination Of Group Problem-Solving Activities.

1. Initiator contributor. Offers new ideas or changed ways of regarding group problem or goal. Suggests solutions. How to handle group difficulty. New procedure for group. New organization for group.

2. Information seeker. Seeks clarification of suggestions in terms of factual adequacy and/or authoritative information and pertinent facts.

3. Opinion seeker. Seeks clarification of values pertinent to what group is undertaking or values involved in suggestions made.

4. Information giver. Offers facts or generalizations which are "authoritative" or relates own experience pertinently to group problem.

5. Opinion giver. States belief or opinion pertinent to suggestions. Emphasis on proposal of what should become group's view of pertinent values.

6. Elaborator. Gives examples or develops meanings, offers rationale for suggestions made before, and tries to deduce how ideas might work out.

7. Coordinator. Clarifies relationships among ideas and suggestions, pulls ideas and suggestions together, or tries to coordinate activities of members of subgroups.

8. Orienter. Defines position of group with respect to goals. Summarizes. Shows departures from agreed directions or goals. Questions direction of discussion.

---

[1] Distributed by LaRetta Garland, Professor, School of Nursing, Emory University, during the Third Regional Conference of the Faculty Development in Nursing Education Project, October 15-16, 1979.

9. Evaluator. Subjects accomplishment of group to "standards" or group functioning. May evaluate or question "practicability," "logic," "facts," or "procedure" of a suggestion or of some unit of group discussion.

10. Energizer. Prods group to action or decision. Tries to stimulate group to "greater" or "higher quality" activity.

11. Procedural technician. Performs routine tasks (distributes materials, etc.) or manipulates objects from group (rearranging chairs, etc.).

12. Recorder. Writes down suggestions, group decisions, or products of discussion. "Group memory."

GROUP GROWING AND VITALIZING ROLES. Building Group-Centered Attitudes And Orientation.

13. Encourager. Praises, agrees with, and accepts others' ideas. Indicates warmth and solidarity in attitude toward members.

14. Harmonizer. Mediates intragroup scraps. Relieves tension.

15. Compromiser. Operates from within a conflict in which an idea or position is involved. May yield status, admit error, discipline self, "come halfway."

16. Gatekeeper and expeditor. Encourages and facilitates participation of others. Let's hear... Why not limit length of contributions so all can react to problem?

17. Standard setter or ego ideal. Expresses standards for group to attempt to achieve in its functioning or applies standards in evaluating the quality of group processes.

18. Group observer and commentator. Keeps records of group processes and contributes these data with proposed interpretations into group's evaluation of its own procedures.

ANTIGROUP ROLES. Attempting To Meet Felt Needs At The Expense Of Group Health Rather Than Cooperating With The Group.

19. Agressor. Deflates ego of others. Expresses disapproval of values and acts.

20. Blocker. It will not work here. We have tried that before.

21. Recognition seeker. Attention to self.

22. Self-Confessor. I know I speak out too often about personal problems, but...

23. Playboy. Lack of Involvement; the cut-up at times.

24. Dominator. Always has an opinion or idea to express.

25. Help-seeker. Can you help me with this?

HANDOUT[1]

Becoming A Nurse: A Selective View
Hans O. Mauksch

Becoming is a Process

Becoming the member of a profession... is a process of multidimensional interaction between the newcomer and the occupational system.

Factors or Important Agents Affecting the Development of the Nurse.

First Impression

Expectations - To be quickly "made" into a nurse.

Expects - considerable discipline to work hard
few early rewards
little prestige

Is impatient - with theory
classroom content

Student Nurse

Is confronted with 24-hour cycle which tends to reaffirm the message "You are now a nurse. You are a nurse at all times."

School of Nursing - Territory of Nurses

Shares with others -
- similar goals
- identical experiences

Symbolism of Uniform - device of social visibility

---

[1] Distributed by LaRetta Garland, Professor, School of Nursing, Emory University, during the Third Regional Conference of the Faculty Development in Nursing Education Project, October 15-16, 1979.

Most Significant Theme of Early Learning Experiences

I. Shift Of Identity From Self To Role

Phases of life from individual responsibility to the realm of professional behavior.

Grooming
Social Grace - evaluated as professional qualities
Manners
Morals

Personal behavior becomes professional domain.

Role failure reflects on the nursing community rather than on the individual.

Transfer of self-preservation from ego to role. Serves as an effective device for protection and guidance because in early experience on the patient unit nurse is less confronted with technical skills than with the impact and sorting of new experiences.

II. The Impact Of Reality

"We have no right to keep them (nurses) away from the patients."

Student nurse experiences differ from the novice of other occupations. Lawyer, teacher, physician have had opportunity to become formally as well as informally acquainted with the norms of their occupation with the role as fashioned by their school community before they are exposed to the reality.

The uncushioned leap from childhood fancy to stark reality seen in context of education and service, between standards of classroom and the practices of the ward.

Coping Mechanisms of Student Nurses

III. The Adolescent Dilemma

Concept of "role aging"
Feeling of - occupational inadequacy
  role insecurity
Demands made on young student nurse to take care of adults.
Ambivalent feelings of student nurses to assume a place in the adult role.
Students resort to their private repertories for coping with adults.

IV. Contact With The Patient (Private Problems)

Manipulation of the human body
Modification of rules of society

Illness and Death

Primary group of student body serves as means of support

V. Additional Reality Factors

Student's expectations as to relationship with patients is not as simple nor as direct as anticipated.

1. Patient Care does not always involve
    - Willing acceptance on the part of the patient.
    - Nurse not always able to render all services patient wants.
    - Patients have anxieties and demands for which student is neither trained nor able to cope.
    - Patients compete for nurse's time.
2. Health Care System not always well integrated, unanimous or cohesive
3. Dichotomy between School of Nursing and Nursing Service
4. Social Expectations

    Segregation by sex
    Implications for boy-girl relationships

HANDOUT[1]

ACTION SHEET[2]

I. How to Insure Effective Communication in a Group

1. Wide opportunity must be present in a group for general and mutual interaction and mutual exploration among its members.

2. There must be at the outset opportunity for the group to get acquainted and develop an "at-homeness" with each other.

3. Goals must be arrived at, understood and accepted by the group.

4. There must be agreement to use the democratic method (collaboration) in all of the operations of the group.

5. In a democratic group, procedural methods must be developed, understood and agreed upon by the members of the group.

6. If there are no discrepancies of perception within or between groups, then no problems will arise to be identified (and conversely problems will be identified when discrepancies of perception exist).

II. How to Function as an Effective Democratic Leader in a Group

1. An effective democratic leader must offer a permissive atmosphere allowing maximum individual participation consistent with group goals.

2. A leader should offer clear procedural leadership.

3. A leader must be sensitive to and flexible in relation to changing group needs.

---

[1] Distributed by LaRetta Garland, Professor, School of Nursing, Emory University, during the Third Regional Conference of the Faculty Development in Nursing Education Project, October 15-16, 1979.

[2] Adapted from material distributed at the National Training Laboratory in Group Development at Bethel, Maine.

4. A leader is obligated to insure that sufficient substantive leadership is invited from group or, when it is not forthcoming from the group, to offer substantive alternatives to insure group activity.

5. A leader should be sensitive to the constant development of feeling that inevitably accompanies interaction in a group and should precipitate its expression at an appropriate time without indicating approval or disapproval.

6. When feelings are expressed, leader should focus on them as features of group development rather than as individual idiosyncrasies.

7. For effective leadership to be exercised, real power must reside within the participating group members, including the leader.

III. How to Function as an Effective Group Member in a Democratic Group

1. An effective group member is sensitive to timing in relation to the contributions in furthering group process and control.

2. An effective group member shares time and leadership functions, e.g., does not monopolize.

3. An effective group member recognizes real power structure in and out of groups, e.g., tries to deal with reality as perceived.

4. An effective group member seeks and gives information for clarification.

5. An effective group member has the courage to express real feelings before they become a block to group progress.

6. An effective group member is willing to become a resource person when needed.

7. An effective group member exercises control over personal problems not related to the group.

8. An effective group member avoids overt, disturbing and blocking behavior.

9. An effective group member must be willing to assume various aspects of leadership relating to substance, procedure, or emotions if these aspects of leadership are not otherwise present in a group.

68

10. An effective group member must participate overtly to the point of communicating to the group clear satisfaction or disatisfaction with potential group decisions _during_ the decision-making process.

11. The greater the role flexibility (ability to assume different roles) of a member the greater effectiveness this person will have in a group.

OR

Preservation of attitudinal set or rigidity of behavior will handicap a member's effectiveness in a democratic group.

ANXIETY-DESENSITIZATION

Sandy Huggins[1]
Staff Development Coordinator
Peachtree Parkwood Hospital
Atlanta, Georgia

There was a young woman reared in a family with 6 children who taught each other how to feel stress and competition. The parents taught some very beautiful things, such as "if you can't do it right, don't do it" and "always put others before yourself." She learned to laugh, love, panic, cry, feel guilty, and to try to be perfect -- not to make mistakes or give up. When stress was there, she did not know it. It was part of being alive.

When she became a nursing student, the values learned at home fitted *very* well into her new experiences. Thus, she attempted to be the best nurse in town, totally skilled in all specialty areas. She made a point to take excellent care not only of her patients, but also instructors and peers. This young woman sought experiences that were difficult, e.g., difficult patients, administering the first intraveneous injection. She enjoyed passing the stress test and could not understand why some students focused on failing instead of winning. Then she made her first error -- an overwhelming mistake -- during an assignment on the pediatric unit. She began to wonder if she could be a "good" nurse. Her performance on tests declined. Although she had been earning B's she started making C's and to think "maybe I *can't* do it." It became difficult to be "Professional." She almost cried when her instructor gave her feedback. The instructor SAID she performed well, but *she* knew she had forgotten to get the patient *ICE* even though the instructor did not know. STRESS HIT!! Luckily, the instructor recognized what was happening and helped this young student see that she could not be perfect.

This young woman became a nurse who learned to recognize and accept weaknesses and strengths. Eventually, she became an instructor. As an instructor she wanted to help students learn some of her lessons sooner than she had. She tried to be the *Best*

---

[1] Formerly instructor in the Department of Nursing Education, DeKalb College, Clarkston, Georgia.

instructor possible, helping her students as instructors had helped her. But there were so many students! And, many of the instructors did not agree with her way of helping students. It was exhausting -- three lectures then supervising students in clinical settings -- checking for errors.
"Please," she frequently prayed, -"Don't let them make a big error!! It might fail them!"

She hated to see students make mistakes and became more aware of how painful failure was to her. She attempted to find ways of recognizing and helping students under stress.

As nurse educators we try, just as we tried as students, to cope with the sources of stress. Some we see, some we don't, but these sources are present in us and in the students.

The identification of stress factors in each of us is important. For example, consider what you SHOULD DO to be the best student or instructor. How do you respond when this area is tested? How can you respond effectively to anxiety provoking situations?

A holistic lifestyle is very effective and necessary for any of the methods one might use to decrease anxiety. Brief descriptions of five approaches follow.

COMMON S-E-N-S-E-S APPROACH

Sleep. "Have to" study? Poor clinical day?

Exercise. Regular or not at all -- not enough "time."

Nutrition. Breakfast at clinical? Crash diet?

Social. Support or alone?

Everyday Awareness. Realistic set of demands on self?

Structure. Delineated priorities in present lifestyle?

People tend to "assume" that all the above are naturally taken care of. Sometimes they fail to make their activities congruent with the current stress level. It is helpful to know the level of stress and to plan activities according to a schedule, e.g., meals, sleep, fun times, and obligations.

Religion

Religion is used by some people to decrease stress. This method works for some, but not for others.

"Test-Wiseness"

Often, this method is used in conjunction with other strategies, e.g., relaxation. Students are taught how to handle their anxieties during tests.

Highly anxious students may find this method most useful, and many schools report the relaxation method to be most helpful.

Self-Awareness

The following techniques may be used: (a) biofeedback, (b) counseling, (c) "hard knocks," (d) articles and research. Many of these require time, some evoke tears, but all are excellent strategies.

Relaxation And Meditation

These tend to give the most rapid relief, can be done independently with very little time involvement and work 99.9 percent of the time. Among the techniques one can use are: (a) yoga, (b) isometric exercises, (c) breathing techniques, and (d) meditation. Faculty must help students learn how to experience the techniques effectively and provide opportunities for the students to experience the exercises as a group.

Special Programs

"Student Survival Seminar"

This approach is used at Kentucky State University and is described in the July 1978 issue of PROJECT REPORT. Students learn how to "survive" in the educational system.

Special Course At DeKalb College (See Handout)

The student participants enjoyed the experiences in "Nursing Preview." They "knew what to expect" in the program, gained a headstart with terminology and communication skills, and met some of the nurse faculty.

Caution should be observed in planning such sessions. Too much emphasis on stress can result in increased fear of stress.

The ideas and examples may assist other nurse faculty in designing activities to lessen stress factors in the teaching and learning environment.

HANDOUT[1]

COPING WITH STRESS IN NURSING[2]

Stress has become the companion of this generation more than for any other age. While it is true that even in ancient times there were stressors, those anxiety producers were visible or identifiable problems that could be directly attacked, or fled from. In today's world oftentimes it is not acceptable to run or fight, and equally as frequently it is difficult to verbalize what is generating the stress without sounding foolish, or perhaps even paranoid. How does one explain to another human the absolute maximum stress of innuendoes experienced in the course of the day: the raised eyebrow, the look of disbelief, the cynical smile, the absence of recognition or acknowledgment. Such social signals can generate threats to the self-system equivalent in experience to the biological threats of survival to another age. Social survival has become the prominent area of current concern to defend. Professional and personal relationships and performance are the genesis of most intrapsychic stress.

Stress expresses itself physically as well as emotionally. Without some means of alleviation or coping, under extreme stress the result will be an emotional or physical illness. Health professionals, particularly staff nurses who constantly experience the bombardment of stress in a working shift, should be most alert to developing coping techniques in an effort to protect and maintain their own health status. There will be individual variations, of course, but the basic structure of coping with stress is always the same.

One guiding principle for the nurse to remember is that the anxiety experienced at times of stress is nothing more than energy that has been contained within the self. It is the same kind of energy that would have been discharged in flight or fight -- but there are rare opportunitites in a health care setting when the nurse has the viable option to do either. In order for the anxiety to be reduced, the nurse must find a way to discharge the high levels of self-contained energy. This goal is best accomplished by use of the large muscle groups in concentrated spans of physical exercise: brisk walking, swimming, tennis, heavy yard work or house work are all excellent ways to discharge energy levels. It is important that such activity be done in a situation removed from the immediate stressors, and that the individual be aware of doing the activity as a means of doing something for reducing tension. Thus, while the physical activity of staff nursing does discharge the energy of anxiety, the situation is such that additional stress factors quickly accumulate without giving the nurse any sense of immediate relief.

---

[1] Distributed by Sandy Huggins, Coordinator Staff Development, Peachtree-Parkwood Hospital, Atlanta, Georgia during the Third Regional Conference of the Faculty Development in Nursing Education Project, October 15-16, 1979.

[2] Prepared by Mary Reres, Dean, UCLA School of Nursing.

The relief of the self-contained high energy results in feelings of physical fatigue which allow the nurse to sleep. Without such energy dispersal, the mind keeps overly active and the individual tends to ruminate over the stressful events and is not rested as additional tensions are experienced. It should be remembered that there is a cumulative effect of stress, and eventually the psychic or physical system will collapse under the overload.

While discharging the anxiety is most effective in immediate stress reduction, the nurse should make every effort to determine the aspects of various situations that make her stress vulnerable. For instance, it is not enough to know that she is under stress with her job and assume that finding other employment will alleviate the problem. Too often such moves only create duplication of the problem. It is more productive to determine the aspects of a situation to which the nurse is stress target specific. This goal is most easily realized by identifying her psychological, emotional and intellectual response cues to stress, and pinpointing the specific occurrence. The cues are as follows:

Physiological

- Increased heart rate
- Elevated blood pressure
- Tightness of chest
- Difficulty in breathing
- Sweaty palms
- Trembling, tics or twitching
- Tightness of neck, or back, or muscles
- Headache
- Urinary frequency
- Diarrhea
- Nausea and/or vomiting
- Sleep disturbance
- Anorexia
- Sneezing
- Constant state of fatigue
- Accident proneness
- Susceptiblity to minor illness
- Slumped posture

Emotional

- Irritability
- Angry outbursts
- Diminished initiative
- Tendency to cry

Feeling of worthlessness
Depression
Suspiciousness
Jealousy
Restlessness
Anxiousness
Lack of interest
Sobbing without tears
Reduction of personal involvement with others
Tendency to blame others
Critical of self and others
Self-deprecating

Intellectual

Forgetfulness
Preoccupation
Rumination
Mathematical and grammatical errors
Errors in judging distance
Blocking
Diminished fantasy life
Lack of concentration
Reduction in interest
Lack of attention to details
Past oriented rather than present or future oriented
Lack of awareness to external stimuli
Reduction in creativity
Diminished productivity

With some review the nurse will identify those work or social phenomena that serve to threaten her sense of self. For example, the stress cues may be most apparent in situations in which she experiences being controlled, or threatened with the loss of a significant person, or argued with, or not given credit, or found to be ignorant of something, overworked or taken advantage of, or put down in front of another person. It is only when such formulation is made that the individual can begin to deal with the underlying problems.

Frequently health professionals tend to confine their sense of identity to the work role. As a result, when the sense of self is threatened on the job, the individual is overwhelmed and may feel a total failure. It is then that the nurse is in need of a meaningful relationship with a significant other who can offer feedback that she as a person is more than her job, more than her power or position, more than her ability to serve. Such reality-based feedback is invaluable in terms of getting the stress precipitant into perspective. It will be by such effort, thought and reflection that the nurse will be able to cope with her own stress, but the reward will far exceed the costs.

HANDOUT[1]

HOW TO CURE EXAM NERVES

Exam nerves are common, understandable, and the cure is known. You can start by taking these steps right now.

1. REALIZE THAT EXAM NERVES AREN'T A TOTAL LOSS.
   Don't try for 100 percent relaxation. It isn't at all favorable for your exam. Experiments with extremely comfortable seats and limp muscles show performance under these conditions is poor. "Optimal arousal" is the key to doing your best. It simply means the degree of concern and muscular readiness best suited for your task -- somewhere between complete relaxation and too much tension.

2. SOME PEOPLE FLUNK THEMSELVES. YOU CAN AVOID IT.
   As if they were actresses or actors, some students consciously or unconsciously cast themselves in the roles of failures. Their past troubles and defeats have built up a dismal self-image. They actually make a habit of failing. They don't try hard enough. They don't give themselves a chance. A a result, after a half-hearted try, they seem to prove they were right! Don't let this happen to you. If you have the failure habit, recognize it and give yourself the chance of success you deserve. Start with this imagination exercise.

   Find a comfortable spot where you can be alone and quiet. Close your eyes. Imagine yourself walking into the exam room. See yourself looking over the questions, and they're all easy! You put down the right answers and feel pleasantly calm. That's for today.

   Tomorrow, a repeat performance, but this time the questions take a bit of thinking. You figure them out, however, and feel encouraged.

   The next day, same scene, but the exam you see with your mind's eye requires all of your ability. Still, you master it and gain confidence.

---

[1] Distributed by Sandy Huggins, Coordinator, Staff Development, Peachtree-Parkwood Hospital, Atlanta, Georgia, during the Third Regional Conference of the Faculty Development in Nursing Education Project, October 15-16, 1979.

The day after that. This time the pretended exam has one or two questions so difficult you have to leave them unanswered. But you do the ones you understand and don't let the ones you can't get you down.

Finally, you imagine an exam that's really hard. You don't do nearly as well as you want. But, you do your best rather than give up. You go home prepared to carry on because your whole life can't depend on one test, one exam.

When those five days are past, repeat the series, one day at a time. Go over each imagined exam scene again. This technique has been scientifically proven to increase students' confidence in their ability to do better on exams.

3. **SPEND YOUR ENERGY ON THE EXAM, NOT ON FEAR.**
   Exam nerves can make you concentrate on fear, so that you neglect the exam questions. Remember this simple formula: Think about the work, not the worry. Focus on the questions themselves. You'll be surprised how well this simple redirection of attention works.

4. **RESPECT YOUR RIGHT ANSWERS, TOO.**
   People with exam nerves are often perfectionists, and if they get nine out of ten answers right, they emphasize the one they missed. Credit yourself with what you do right -- there's always at least something in that category. As you proceed with the exam, keep this in mind.

5. **OF COURSE, PREPARE.**
   An absoultely solid training rule for avoiding panic and anxiety is preparation for the situations that may cause them. For certain types of exams, such as most intelligence tests, almost no preparation is needed or even possible. But you can run through the practice tests often available. They do let you know what to expect and that's calming.

   Preparation for the usual exam should start on the first day of the course. Take selective notes. Review the last few pages of notes quickly before each class meets, and review all of them from time to time. Jot down questions to ask in class or afterwards, and spot items you want to look up in reference books. Do reading assignments on schedule, as you go along. Don't let them pile up for one great cram session. Depending on how hard the material is for you, stop at the end of each paragraph or section to see if you can sum it up in your own words. Underlining main passages may help. Cards with the topic named on one side and your summary of it on the other are useful aids. (You look at the topic named, see whether you understand it, and put aside that card if you do. If you don't, you put it back in the pile that will get a second try.) Reciting formulas and summaries, as well as important concepts and definitions, helps emphasize what you're learning.

In plenty of time before the exam, be sure you know what the exam will cover, the extent of skill or knowledge expected, and the type of exam to be given -- essay, multiple choice, true or false, fill-in, or combinations of these styles. For your cumulative review, use your calendar to make a specific schedule to deal with the material.

Don't overdo it. Staying at your desk or in your study chair may look noble, but it soon gets hopelessly inefficient as you get diminishing returns on your investment of time and energy. Plan rest periods in advance, as well as study periods. Jot these down on your calendar, too. This relieves you of the anxiety about having enough time. Relaxation and enough sleep are at least as important as effective study.

6. IN THE EXAM ROOM -- USE THESE AIDS.

Expect in the first few minutes to perhaps get a funny feeling in your stomach, quicker heart beat, a flushed facial sensation. Just wait a few minutes and these nervous reactions will generally go away. Take two or three deep breaths, let them out slowly. Or you can do this little exercise to relax: Contract muscles all over your body, and then let go.

Next, look over all the questions briefly, to size up what's expected. Be sure to note instructions and then follow them exactly. (A lot of credit is lost when this is overlooked.) Assign the right proportion of time to each question in proportion to how much each is worth. Answer the easier ones first, to accumulate as many credit points as possible from them. Don't spend too much time on any one question or "get stuck" on the hard ones. (Many students lose out because they answer a few questions beautifully but neglect others that are equally important.)

Is it an objective exam, which simply asks you to choose the right answers or fill them in? If there's no penalty for "wrong," guess. Statistically, this is better than leaving blanks and what seems like pure guesswork is more often right than wrong. Don't change answers unless you're sure. Changed answers are more often wrong than right.

Is it an essay type of exam? 1. Jot down main points on scratch paper without worrying about their sequence. 2. Then number each point in proper order. 3. Write your essay, following your numbered outline. Underlining the main points, if permitted or required, helps the reader follow your thoughts. Write legibly. Number your answers plainly. It doesn't help to irritate a professor by making your paper impossible to read.

Don't take off if you finish a bit early. Use leftover time to check spelling, punctuation and grammar. Could you add something here or there? Could you try again where you missed out?

If you follow these guidelines, you'll have played the game as well as you can -- you'll do your best.

HANDOUT[1]

EXAMPLE OF COURSE OFFERED AT DEKALB COLLEGE
N100: NURSING PREVIEW
3 Credit Hours

The purpose of this course is to develop in the beginning nursing student specific abilities in the areas of study habits, communication skills, personal growth management, and tension control.

At the end of this course, students should be able to:

1. Independently develop and organize study habits appropriate to nursing study requirements;
2. perform and understand the skills of assertive behavior, empathetic listening, and the dynamics of feelings;
3. develop increased self-awareness and priorities of a holistic life-style;
4. choose appropriate means of reducing situational anxiety from among various skills presented.

The student will meet for two hours daily for a period of three weeks. Lectures and laboratory methods will be used to facilitate the learning experiences. Evaluation of successful completion of the course requirements will be based on written tests and practical demonstration of skills.

This course will be offered in the Summer Quarter only for students who have been accepted into the Nursing Program for the following Fall Quarter. Faculty for this course will include the nursing counselor and nursing instructor(s).

---

[1] Distributed by Sandy Huggins, Coordinator, Staff Development, Peachtree-Parkwood Hospital, Atlanta, Georgia during the Third Regional Conference of the Faculty Development in Nursing Education Project, October 15-16, 1979.

HANDOUT[1]

WHAT'S YOUR SCORE ON THE STRESS TEST?

LIFE EVENT	POINT VALUE	YOUR SCORE (insert values from column at left)
1. Death of spouse	100	______
2. Divorce	73	______
3. Marital separation	65	______
4. Jail term	63	______
5. Death of close family member	63	______
6. Personal injury or illness	53	______
7. Marriage	50	______
8. Fired at work	47	______
9. Marital reconciliation	45	______
10. Retirement	45	______
11. Change in health of family member	44	______
12. Pregnancy	40	______
13. Sex difficulties	39	______
14. Gain of new family member	39	______
15. Business readjustment	39	______
16. Change in financial state	38	______
17. Death of a close friend	37	______
18. Change-i.e., different line of work	36	______
19. Change in number of arguments with spouse	35	______
20. Mortgage over $10,000	31	______
21. Foreclosure of mortgage or loan	30	______
22. Change in responsibilities at work	29	______
23. Son or daughter leaving home	29	______
24. Trouble with in-laws	29	______
25. Outstanding personal achievement	28	______
26. Wife begins or stops work	26	______
27. Change in living conditions	25	______
28. Revision of personal habits	24	______

(More)

---

[1] Distributed by Sandy Huggins, Coordinator, Staff Development, Peachtree-Parkwood Hospital, Atlanta, Georgia during the Third Regional Conference of the Faculty Development in Nursing Education Project, October 15-16, 1979.

LIFE EVENT		POINT VALUE	YOUR SCORE (insert values from column at left)
29.	Trouble with boys	23	______
30.	Change in work hours or conditions	20	______
31.	Change in residence	20	______
32.	Change in recreation	19	______
33.	Change in church activities	19	______
34.	Change in social activities	18	______
35.	Mortgage or loan less than $10,000	17	______
36.	Change in sleeping habits	16	______
37.	Change in number of family get-togethers	15	______
38.	Change in eating habits	15	______
39.	Vacation	13	______
40.	Christmas	12	______
41.	Minor violations of the law	11	______

YOUR TOTAL: ______

THE USE OF SIMULATED LEARNING EXPERIENCES IN TEACHING AND EVALUATING CLINICAL NURSING PRACTICE

Shirley Dooling
Dean
School of Nursing
University of St. Thomas

This paper will describe a teaching-learning and evaluation strategy, known as simulations, which was used at the University of St. Thomas School of Nursing.[1]

In July, 1976, the School of Nursing received a $150,000 grant from the Department of Health, Education, and Welfare (5D10-NU-01539-03) to develop simulated clinical nursing experiences for:

1) The instruction of baccalaureate nursing students in applying theory to the decisions necessary in caring for individuals and families in the hospital or community settings.

2) The evaluation of knowledge and skills of licensed vocational nurses and registered nurses from diploma and associate degree programs, i.e., the simulations were to be used for the clinical portion of their advanced standing examination.

The overall focus of the grant was to develop and test these simulations, not to prove their value versus some other instrument in either instruction or testing. We developed 26 simulations

---

[1] This author wishes to acknowledge the assistance of Carolina N. Adamson, R.N., Ph.D., principal investigator for the grant, in writing this paper.

The Concept

In this age of reproductions, the word simulation is not strange to us. A simulation is a depiction of the real thing, e.g., simulated leather, simulated wood, simulated marble, simulated ham, etc. It is a model that may be physical or conceptual. Simulation may be manifested as a product, a diagram, a physical description, a series of pictures--or a combination of several.

Use Of Simulations

During World War II and the rapidly evolving age of technology, simulators were developed for training airline pilots or other technologists. With the space age, simulators were developed to imitate the problems and conditions astronauts would encounter when leaving the gravitational field of earth; problems to be confronted when living in confined quarters under conditions of zero gravity; and problems they might have on reentering the earth's atmosphere. The simulators were invaluable in assisting scientists to anticipate and evolve alternative solutions to difficulties, free from the pressures of time and danger.

Despite widespread familiarity with the principles that underlie the intriguing approaches to depicting the "real world," and despite an almost universal acknowledgment of the demonstrated effectiveness of simulations, only recently have they been used in the education of physicians, dentists and nurses. Finances, technology, and creativity have been three inhibitors, but now these are giving way to the benefits of simulation.

In nursing education, simulations are just beginning to be used. Many schools own IV arms, Gynny male and female cath models, and have set-ups of patient units. These are the most common forms of simulated learning experiences now found in nursing education, but a few programs are beginning to develop Patient Management Problem Simulators (PMPs). The earliest reported work done in this area was by Rheba de Tornyay at the University of California in San Francisco. In 1968, she developed a simulation in an effort to measure whether the newly integrated curriculum produced a student more capable of problem solving than the graduate of the medical model-block type of curriculum. Occasionally, in the 1970s, RN magazine published a few additional simulations written by her corporation; however, most of these dealt with nursing actions based on delegated medical tasks, i.e., physicians' orders and indicated interventions due to surgical or medical therapies. They did not deal with nursing decisions except whether the nurse would or would not carry out the order and whether she understood the rationale underlying it.

In 1976, the project staff at the University of St. Thomas visited the University of Illinois in Chicago and the University of California in San Francisco. The staff reviewed two nursing simulations at the University of Illinois and three at the University of California.

At the University of St. Thomas, simulations were developed to measure students' ability to apply knowledge to new situations or problems. The 26 simulations were designed after the PMP model developed by the Office of Medical Education at the University of Illinois. The simulations consisted of a patient care situation with branch formats to permit many variations in individual approaches to a solution. The problem was introduced by a brief description of the situation and the student's role in the problem. The student then selected options from a series of possible approaches to the problem by developing a latent image on the booklet corresponding to his choice. The latent image response gave a feedback on the consequences of the student's decision and instructions directing him/her to sections of the problem dealing with that aspect. The type of feedback presented from the choice of options conveyed the primary purpose of the simulation, i.e., whether for teaching-learning or evaluation. The problem to be solved differed in its solution depending upon the unique configuration of choices made by the student. A criterion group classified each of the available choices and selected the optimal pathway in solving the problem. This criterion group consisted of professors of nursing at the University of St. Thomas School of Nursing. They classified each of the available choices into one of five categories. Each choice was assigned a positive, zero, or negative weight reflecting the magnitude of the patient and/or problem response to the decision. These weights ranged from -16 to +16 points.

Characteristics Of A Written Simulation

McGuire lists seven characteristics of a written simulation:

1) The problem must be presented in a form that resembles it in the real world, i.e., it is not a predigested summary of the salient features of a situation.
2) The simulation must require a series of sequential, interdependent decisions representing definition of the problem, interpretation of data obtained, and resolution of the problem.

3) Opportunity must be provided to make realistic choices in a realistic way with a realistic feedback.
4) Once a decision is made to do something, i.e., elicit data or intervene, it must be impossible to retract it when the feedback shows it to be ineffectual or harmful.
5) The simulated problem must be constructed so that it allows different approaches and variation in feedback appropriate to these differing approaches.
6) Provision must be made for modifications in the problem in response to specific actions taken.
7) These modifications must differ among students according to the unique configurations of decisions made by each (McGuire, et al, 1974).

How To Write A Simulation?

In selecting simulation techniques to evaluate individual competency, the same considerations are applicable as those in choosing other testing or evaluation techniques. Likewise, in selecting material for instructional use of simulation, it is important to decide what specific competencies are to be developed or measured at each level of education and experience. Once this decision has been made, the most appropriate technique must be selected for the student to perform the simulated task representing as closely as possible the real-life situation. The simulation then must be designed so that different observers who are evaluating the student are in agreement on the character of the student's performance in a situation. In addition, a sufficient number and variety of tasks must be created to insure generalization from the student's performance on the exercises and the overall level of competency. Lastly, economic feasibility and logistic consideration must be taken into account in the selection of any assessment technique.

Simulation imitates life; yet this is its greatest limitation. Some aspects of reality cannot be duplicated economically at the present time. If simulation is to be undertaken, caution is necessary in predicting how an individual will actually behave in reality or on the basis of responses to a simulated situation. It is important to recognize that simulation is not an appropriate method for measuring all aspects of performance, nor is it 7 necessarily beneficial in all forms of teaching. For example, factual information is conveyed more economically and measured more directly by conventional techniques of instruction and testing. On the other hand, appropriate professional habits are most firmly entrenched by repeated reinforcement over a long period of time in diverse settings. Simulations can be advantageous in several ways.

Perceived relevance

Compared with more conventional teaching and testing techniques, simulation offers the possibility of designing instructional and assessment exercises so that there is a closer correspondence to real situations than would be true in typical readings, lectures, multiple choice tests, or traditional oral quizzes. Perceived relevance is a psychological and motivational benefit.

Pre-determination and pre-selection of a task

Relevance can be achieved without dependence on the flow of patients available at the specific places and times that instruction takes place or assessment is to be made. As a consequence, simulation makes it possible to determine precisely the task the students are to learn and to perform. Further control is exerted by being able to eliminate undesirable distractions. Preselection of tasks in simulation allows for the tasks to be carefully graduated in difficulty as the student progresses--a component of prime significance in increasing the efficiency and effectiveness of both instruction and evaluation. Simulations which are parallel also help the student confront challenging variations of what is essentially the same task repeatedly, until the task is mastered and the student can demonstrate mastery to an examining body.

Standardization of the task

Simulation enables the task to be standardized for all participants, and to do so without subjecting patients to repeated examination by a large number of practicing students. In short, all students may be given the same problem to work with and master without risks to patients.

Improved sampling of performance

Standardization of tasks and the focus on the most important aspects of each one makes it possible in a certain time period to expose the student to a much broader and more representative group of patients and to sample the student's performance. Careful selection and definition of the tasks are required, and it is this benefit of simulation that reality can rarely provide in a reasonable time frame.

Improved rating of performance

When tasks are precisely defined and selected for an instructional unit or evaluation, a student's performance may be recorded in detail for subsequent feedback in a way that maximizes the student's learning. For evaluation purposes, criteria are equitable and consistent. Consequently, the degree of reliability achieved in scoring performance with simulated problems and simulated interviews is superior to the reliability found when working with real patients.

Increased responsibility and realistic feedback

An important advantage of using simulations over reality is that students may be allowed full responsibility for the work-up and management of the simulated patient without any risk to actual patients. If students' interventions are inappropriate with the simulated patient, they can still be allowed to continue without supervision, receive realistic feedback, and learn the consequences of the action from firsthand experience, without harm to anyone. The simulated patient can develop complications induced by faculty management, grow worse in condition, die, commit suicide, and yet be repeatedly revived to serve in edifying students' knowledge.

Compression of real time

A student also needs to learn how to handle chronic diseases without spending months or years that observation of the patient's gradual deterioration entails. In carefully developed simulations, a lifetime of chronic disease can be compressed into a half hour problem and, at each stage of the disease, students can be provided with feedback on their interventions in a form that is more instructive than a life situation would be.

Increased learning

Traditional instruction rarely provides authentic and relevant feedback, and reality often furnishes feedback indirectly, equivocally, and after a long delay. In contrast, the prompt, specific, and unambiguous feedback characteristic of a well-designed simulation makes it a powerful tool for the enhancement of learning.

Clinical problems intended to simulate the patient-nurse encounter have particular characteristics. First, the problem must be initiated by information similar to that a nurse would encounter with a patient. It must be couched in terms used in the real life situation. Second, the exercise should require a series of sequential, interdependent decisions, representing the various stages of management of the patient. Third, there must be opportunity to gather information in a realistic form concerning the results of each decision, thus serving as a basis for subsequent action. Fourth, once data are obtained, the student must not be able to retract a decision which has been revealed as ineffective or harmful. Fifth, the problem should be constructed to allow for different approaches. Consequently, modifications are required in the problem as the patient responds to the specific interventions chosen by the student. Lastly, these modifications must differ among students, according to the unique configuration of prior decisions each made (McGuire and Bobbott, 1976).

In the selection of problems for simulation, it is necessary to avoid a uniform stereotype pattern which might have the effect of rewarding the same general type of approach. At the University of Illinois, for example, the authors noted that among the exercises developed for medical students, some problems dealt with emergency situations in which only a minimal, initial diagnostic work-up was indicated. Other problems may require thorough evaluation about specific conditions prior to any decision about therapy; here the student may fail to withhold treatment long enough to collect all the data essential to intelligent management. It was pointed out that the diagnostically simple problems may tempt the compulsive or insecure student to indulge in an over-elaborate work-up, continuing to order tests long after he has obtained adequate confirmation of his working diagnosis. Other exercises may deal with the long-term course that a chronic disease takes. A wealth of information is available to nurse educators for developing problems, simulated settings, and realistic options. This can be done by consulting nursing care plans, patient records, observing on a unit to identify actions taken with patients, and interviewing nurses and students as to what they are doing and why.

How To Score The Simulation

A criterion group of experts in the relevant specialty area is chosen to score the simulation. This proved to be somewhat of a problem based on our studies of differences between educators and nurses in practice, nurses in various regional settings, and differences among nurses of various educational backgrounds.

For purposes of the simulation, nursing decisions were classified as to type and effect. Types were decided according to categories obtained within the objectives. The types were as follow:

1. Data gathering actions. Includes actions in which the nurse was seeking information about the patient, either by the use of a technical procedure, through observation, or through questions.
2. Patient care actions. Refers to specific actions taken with an intended therapeutic effect, either physical or psychological.
3. Communications. Includes those communication items in which the nurse speaks to the patient or to some other person when the communication is intended to be therapeutic.
4. Environmental management. Includes those actions in which the environment is arranged to facilitate nursing actions.
5. Professional referrals. Includes those actions in which other professionals are used as part of the nursing intervention or in which the responsibility for the intervention is given to another professional.
6. Recording. Involves the recording or reporting of data.

Each of the opportunities for decisions (options) is also classified as to effect, thus giving a two-way matrix. The categories for classifying the effect of decisions are as follows:

1) Indicated and essential -- +16 points.

2) Indicated but not essential -- +8 points.

3) Not helpful, not harmful --zero points.

4) Not indicated and inefficient -- -8 points.

5) Harmful -- -16 points.

The positive, neutral, or negative rating given to each of these decisions reflects the judgment of the criterion group. As a result, it is possible to numerically identify the combination of choices which constitute skilled management, adequate care, or totally inadequate care of the patient. Several methods of summarizing the pattern of responses have been developed.

The system that is currently being favored is composed of five scores: efficiency, proficiency, errors of omission, errors of commission, and a composite index of overall competency. To score efficiency, the percentage of the student's choices which are most helpful to the patient is reported. Proficiency is the percentage in which the student has selected interventions regarded by the criterion group as "indicated and essential" and has avoided those classified as "harmful." Failure to achieve 100 percent proficiency is attributable to a combination of "Errors of Omission and Errors of Commission," for which scores are reported in percentage. The composite index is reported as a function of both efficiency and proficiency and is computed by a formula that assigns greater weight to the latter. Scores can be obtained for individuals and groups on a series of problems, individual problems, sections of problems, or combinations of specific sections of several problems that deal with the same aspects of clinical judgment (McGuire, et al, 1974).

Various patterns of scores that reflect different problem solving are identified. The decisions of some students may correlate closely with those of the criterion group. These students may be described as thorough and discriminating in their approach, having high to moderate efficiency and proficiency scores with few errors of either omission or commission. Some, however, elect a combination of choices that is regarded as a "shotgun" approach to patient care. These students have a low efficiency score and moderate to low proficiency scores, usually combined with many errors of commission and a few errors of omission. Other students make combinations of choices which are described as a constricted approach to patient care. They have high efficiency scores and moderate to low proficiency scores with few errors of commission and many errors of omissions.

Validity And Reliability Of Simulation Exercise

In assessing the validity of a simulation, it is necessary to consider two questions: (1) Does the content actually sample the subject matter, the types of situations, the settings, and types of decisions about which inferences regarding student skills were to be made? and (2) How do these scores relate to an external criterion, such as scores on another test or on observations of performance which measures these same variables?

The first question addresses itself to the type of validity termed content or "face" validity and may be judged by essentially two sources: (1) expert opinion dealing with the content and intellectual processes sampled in the simulation and the content and processes involved in the skills and abilities about which inferences are made; and (2) student judgment regarding similarities between the intellectual processes used in responding to a simulation and the processes employed in the real situation which was simulated (McGuire, Solomon, Bashook, 1974). Since face validity depends on the subjective impressions of aspects of "reality" presented by the simulation, the opinions of both the criterion group and the students were investigated through systematic inquiry. Similar to findings by medical educators using written simulations, nursing students agreed that the processes involved in interacting with the problem tended to approximate the processes involved in making decisions and setting priorities in the clinical area. Such remarks as the following were common: "It was the closest experience to real life I've ever encountered on a paper-pencil format." Criticisms of simulations included inadequate indentification of the student's role in the situation, unclear instructions, and lack of options a student wished to choose.

The second question considered in the assessment of validity dealt with concurrent or criterion-related validity. Evidence stemmed from correlations between scores on each simulation and scores on another measuring instrument of the same or similar skills and competencies.

Experts in the area of written simulations have generally concluded that the intellectual processes which must be used in a simulated patient problem differ in quality from those employed in conventional tests (McGuire and Babbot, 1967). This is significant because of the variable one is attempting to measure with the written simulation, i.e., clinical problem solving with emphasis on process as well as final product. The University of St. Thomas School of Nursing attempted to study the relationship between performance on a simulation and problem-solving skills.[1]

Reliability is based upon the assumption that an observed score is comprised of two components, a "true" and an "error" score. The total variance of a test is made up of these two sources--"true" variance and "error" variance. For this reason, then, the most popular methods of estimating reliability are designed to determine the proportion of the total test variance attributable to the error variance (Kerlinger, 1973).

---

[1] Information regarding this research will be shared upon inquiry. Direct inquiries to Dr. Shirley Dooling, Dean, University of St. Thomas School of Nursing, 3838 Montrose Avenue, Houston, Texas 77006.

Four characteristics of written simulations which may have the effect of reducing reliability have been identified:

1. Items are differentially weighed.
2. Items are interdependent.
3. Differential amounts of feedback obtained by examinees result in changes in the nature of the problem posed by each item.
4. A student may not be given the opportunity of responding to many of the items because his earlier decisions led him to an instruction that omitted entire sections of the problem (McGuire and Babbot, 1967).

Some authors of simulations have utilized the test-retest method to establish reliability of instruments (de Tornyay, 1978). Problems which tend to contaminate the outcome include learner maturation and growth between testing (especially since simulations tend to make a rather forceful impression upon the minds of those who have made wrong decisions), lack of control of intervening variables, and difficulty in establishing appropriate length of test-retest intervals. At the University of St. Thomas, the Cronbach coefficient alpha was employed to estimate the consistency of measurement or generalizability of results across the subtests of simulations. Of the 26 simulations developed thus far, extensive field testing produced Alpha reliability coefficients ranging from .002 to .995.

Simulated clinical nursing experiences is not a panacea to the varied problems in clinical learning experiences, e.g., those students who find too many distractors in the real-life situations, students who need more opportunity to practice or prepare for a specific clinical situation, or nurse educators who need measures to evaluate the clinical learning of the licensed vocational nurses, diploma graduates or the associate degree graduate seeking advanced standing credit. Clinical simulations, based on a decision-making model, do have merit in the instruction and evaluation of students. Much more research is needed, particularly in attempts to demonstrate the effectiveness of the use of simulations in a teaching-learning situation. Designing simulations is a time-consuming, but interesting and rewarding experience.

References

Abrahamson, S. and Atel, R. "A Description of a Computer Managed Automated Robot Designed for Use in the Instruction of Residents and Anesthesiologists." Journal of Medical Education, (1969), 515.

Andrew, Barbara J. "An Approach to the Construction of Simulated Exercises in Clinical Problem-Solving." Journal of Medical Education, 47 (December 1972), 952-58.

de Tornyay, Rheba. "The Effect of an Experimental Teaching Strategy on Problem-Solving Abilities of Sophomore Nursing Students." Nursing Research, 17:2 (March-April, 1968), 108-14.

Dewey, John. Logic: The Theory of Inquiry. New York: Henry Holt and Company, 1978.

Kerlinger, Frederick. Foundations of Behavioral Research. New York: Holt, Rinehart and Winston, 1973.

McGuire, Christine and Wezeman, Frederick. "Simulation in Instruction and Evaluation in Medicine." WHO, Public Health Papers, 61 (1974), 18-34.

McGuire, Christine; Solomon, Lawrence; and Bashook, Philip. Written Simulations: Their Construction and Analysis. New York: Appleton-Century-Crofts, Inc., 1974.

McGuire, Christine and Babbott, David. "Simulation Techniques in the Measurement of Problem-Solving Skills." Journal of Educational Measurement, 4:1 (Spring, 1967), 1-10.

ELIMINATING LEARNING OBSTACLES

Gail B. Kettlewell
Assistant Professor
Tidewater Community College

Our efforts include a combination of counseling and developmental studies. The science and technologies counselor keeps a statistical record of students who are failing in nursing, determines the problems, and works with the nursing faculty and reading consultant to remedy the situation. All applicants to the college take the Comparative Guidance and Placement Test. Students interested in nursing also take the Nelson-Denny Reading Test. They need to score on the eleventh grade level or equivalent on both tests. If either of these shows a deficiency, then the student is counseled into the appropriate developmental courses which are developmental reading, science, and math. After students satisfactorily complete the developmental courses, they are admitted to nursing. The counselor works out a weekly schedule with the students, trying to show each realistically what to expect in terms of required hours for study, class, and other responsibilities. There is a continuous dialogue between the nursing faculty and the counselor. The students are aware of this and appreciate the added attention and dedication of the staff.

A second factor in improving the academic status of students on our campus is in the area of reading. The nurse education majors may be requested to take developmental English/reading. Once they have completed these courses, they may enroll for advanced reading classes which will enable them to gain fluency, acquire further vocabulary growth, and improve their study skills. The two advanced reading courses are scheduled each quarter for the general student body. In addition, a "reading in science" course is offered for students reading below the tenth grade level. Students may enroll and study "reading in science," vocabulary in science, and study skills while they are also taking developmental health science.

It is important to understand that skills and mastery effectively used on a timed test will not come simultaneously. Once the skill is learned, it takes time to reach fluency, especially with students of differing cultural and educational backgrounds. It might also be noted here that test-taking skills should and can be taught during such a course.

The developmental consultant examined seventeen nursing text for readability level and study helps. A copy of the results is attached. The nurse faculty found these results to be helpful in selecting textbooks.

The nurse faculty learned to do readabilities on textbooks so that, as new books come in for adoption, they can examine content and suitability for reading and study. Using the Cloze Procedure Test faculty can perform another quick check on suitability for texts in the classroom during the first week of classes. It will show whether the text is on a student's instructional or independent reading level, and will indicate success with the text.

Faculty members have learned the SQ3R study technique procedure so that they can use it with each textbook to show their students how to get the most information from a textbook. These approaches are described below:

The Fry Readability Scale. It is important to know how to determine the readability of a textbook. Using the Fry Readability Scale the following steps can be performed.

1. Randomly select three sample passages and count out exactly 100 words beginning with the first word of the sentence. Count proper nouns, initializations, and numerals.
2. Count the number of sentences in each 100 words, estimating length of the fraction of the last sentence to the nearest 1/10th.
3. Count the total number of syllables in each 100-word passage. Add that number to the 100 words to give syllable count.

   (Example: 100 words + 60 syllables = 160)
4. Use the scale to determine grade level.

Syllables	Sentences
150	4.5
167	5.1
172	4.8
___	___
Total	Total
Average: 163 (use 164)	Average: 4.8
Grade Level: 12	

EXAMPLE of syllable count: Copper is essential to hemoglobin synthesis.

6 words + 8 other syllables = 14 syllables

The Cloze Procedure Test. Another test, the Cloze Procedure Test, can be used to determine the suitability of a text for entire class or individuals.

Method: A. Select a 250 word passage at beginning of textbook.

B. Type the passage omitting exactly every 5th word.

C. Hand out copies to each member of group and have student read complete passage silently. Then have him complete every blank with best word he can.

Scoring: A. Count up number of blanks containing exact words.

B. Divide the number of words exactly replaced by the total number of blanks.

(45-50 percent correct shows book is on student's INSTRUCTIONAL level. 60 or more is on INDEPENDENT reading level.)

C. Multiply above score by 1.67 to determine comprehension of grade level.

Note: If grading includes use of context clues, then synonyms may be accepted as correct answers, e.g., doctor/physician.

Determine the suitability of a text for nursing using a test like the following example from Medical Surgical Nursing. 6th ed., p. 3 (Shafer).

The Patient and the Nurse

"The patient is a person" and "Patients are people" are phrases
used frequently in the nurse's education. These or similar phrases
1____ to remind the nurse 2____ the patient, whoever he 3____ be,
is a human 4____ with hopes and desires, 5____ and dislikes,
strengths and 6____. The patient may be 7____ man or a woman,
8____ boy or a girl, a 9____ or an elderly person. 10____ he is and
his 11____ are important. They are 12____ paramount importance to
him 13____ they should be a 14____ important consideration in his 15____.

Being a patient places 16___ person in a unique 17___. The number of places 18___ patient care is offered 19___ are numerous and differ 20___. The person who becomes 21___ patient is often described 22___ "one who is under 23___ care of a physician 24___ in a hospital." Patients 25___ receive care in the 26___ office, in the outpatient 27___ of a hospital, in 28___ own homes, in nursing 29___, in other institutions, and 30___ recently in offices of 31___ in private practice. Regardless 32___ where care is given, 33___ experience has special meaning 34___ the patient. Perhaps for 35___ people, institutional care has 36___ greatest significance. The fact 37___ the person is away 38___ his home, family, friends, 39___ usual way of life, 40___ for only a short 41___, and is faced with 42___ of disease or illness 43___ unpleasant experiences my tax 44___ resources in understandings and 45___ adaptation.

The individual who becomes 46___ patient in a hospital 47___ on a different status 48___ is surrounded by circumstances 49___ unlike his usual ones. 50___ total environment becomes different from the familiar.

The SQ3R Study Technique. The SQ3R Study Technique can help students use textbooks more effectively. The five steps of SQ3R are:

1. S = Survey

   Read the title of the chapter.
   Read the introductory statement.
   Read all main headings in order.
   Study illustrations and read the concluding statement or summary.
   Try to recall the outline of the chapter before going on.

2. Q = Question

   Look at the first main heading.
   Ask yourself what it means.
   Ask yourself questions that you think might be answered in the section. For example, if the heading is "Formal English," ask yourself questions, such as: What is formal English? Do I ever use formal English? When should I use it? What other levels of English are there?

3. R_1 = Read to find the answers to your questions.
   If the answers are not there, you may wish to find them somewhere else. These are good questions to ask in class or to go to the library to find the answer.

4. R_2 = Recite

Recite the answer to yourself to help you remember it.
Ask yourself if the answers given by the author make sense.
Ask yourself if you have a new idea which you can use--perhaps in a written assignment or in conversation or in performing a task.

5. R_3 = Review (or Reconstruct)

Review the whole chapter in a "survey" fashion, but with the details filled in. Then reconstruct the outline in your mind or on a piece of paper.
Try to recall important ideas the author has discussed.
Ask yourself some interpretive level or critical-creative-evaluative levels questions.
Try to think of applications of the ideas learned.

Some of the specific cognitive skills we believe a student must possess in order to be successful are: (1) determining main ideas and details, (2) noting sequences, (3) recognizing cause and effect, (4) classifying, (5) summarizing, (6) comparing.

This is by no means an exhaustive list of reading skills a college student should have mastered to begin the nursing program. It is, however, representative of the complexity of reading and thinking/organization/structure which students must be able to handle for success. And this is only in the realm of comprehension. Just as important are vocabulary and study skills. A student must be able to unlock words or see familiar forms in new words. Textbooks which list important prefixes, roots, and suffixes from Latin and Greek aid students who already have language barriers.

Common study skills for college students include the ability to use the textbook efficiently, take notes, write summaries, use the dictionary, and know how to take tests. Students who have never needed these skills need your help.

Although students may enroll in developmental English courses, unless there is carry-over from the developmental class to the nursing class, the students still have difficulty. One problem instructors face is that they already know and use these skills. They seldom analyze what skills are inherent in the assignment and do not point out possible blocks to learning before the student reaches them. Another problem is that a student who has learned about these skills and techniques cannot have mastered them in ten or twelve weeks. The student is now AWARE of the larger realm of comprehension and has some experience. Continued awareness from the science or nursing instructor can help a student to grow.

Students can only learn the skills and the course material if they have the attitude and motivation to do so. Therefore, it is important that we consider the affective domain. Krathwohl's taxonomy is useful in discussing the affective domain, e.g., commitment, valuing, receiving, attending.

We know, of course, that without commitment little learning can take place, at the knowledge or any other level. A student who has problems of motivation, goal-orientation, failure, or acceptance must be considered in terms of commitment to the program before we tackle intellectual growth. In fact, one of the greatest learning obstacles students have is attitude of faculty toward them. What affective behaviors do we expect of ourselves in aiding the student's growth, change, and independence as a learner and as a nurse?

In a list of skills needed by faculty for working with students of differing cultural, educational and social backgrounds are two human relations skills. First, faculty must understand that the student KNOWS how he is being treated. Second, the instructor must also UNDERSTAND how he is treating the student. Before writing affective behaviors for students, educators ought to write them for themselves.

How do we identify a student's affective obstacles to learning? First, counseling will pick up some idea of a student's self-concept in interviews before the program begins. Some schools administer a self-concept test by using the Rotter Self-Concept Scale or the Nowicki-Strickland Internal-External Test. How the student sees himself and his attitudes toward school and learning can help us in advisement and instruction. Another type of indicator of student attitude can be self-made. This is in the form of an incomplete sentence test. Such a measure is easy to construct and administer. It quickly gives the instructor a look at the students' hidden agenda (the emotional, attitudinal baggage he carries with him everyday) which may have everything to do with whether he passes or fails. The following example, a revision of a secondary level test from Reading Diagnosis Kit (Wilma Miller), follows.

INCOMPLETE SENTENCES TEST

1. My favorite subject in college is
2. I sometimes am afraid of
3. I never want to
4. Most of my instructors are
5. Going to college is
6. I hope that I can
7. I think that my life is

8. I like it when my husband/father
9. My favorite person is
10. I get kind of depressed when
11. Doing homework is
12. I think that my brother/sister is
13. Most of all I would like to get
14. My home is usually
15. I get angry when
16. I am unhappy when
17. I hope that my future is
18. Grandparents are
19. My family thinks that I
20. I wonder if
21. My family/spouse feels that my grades are
22. I like to read books about
23. I think that college is
24. I think reading the newspaper is
25. I hope that I will never have to
26. I sometimes get nervous when
27. The easiest thing about college is
28. I am happy when
29. I don't like it when my family/spouse
30. Studying in college is
31. I like it when my wife/mother
32. I would really like to

107

33. When I get out of college, I hope to

34. I sometimes worry about

35. I think that reading science books is

36. If I could be anything in the world, I would want to be

37. In an English course, I usually like to read about

38. I think the future will be

39. Reading social studies books is

40. My family thinks that reading is

41. Reading math word problems is

42. This college is

In summary, it is important that all educators are familiar with the types of learning and those measures that can be used to minimize obstacles to learning. It is imperative that persons in developmental studies and other disciplines collaborate in their efforts to maximize learning opportunities.

NURSING TEXTBOOK READABILITY CHART

	Bergerson Pharmacology	Burgess Psychiatric	DuGas 3rd Patient Care	French Diagnostic Procedures	Fuerst 5th Fundamentals of Nursing	Kurtz Workbook-Medical/Surgical	Lewis Patient Care	Marlow Pediatrics	Metheny 2nd Fluid Balance	Normac 3rd Scientific Foundation	Reed Maternity	Sackheim Math/Nursing	Shafer Medical/Surgical	Smith 4th Patient Care	Williams 3rd Nutrition
Foreword/Preface		X	X	X	X			X			X	X	X	X	X
Table/Contents	X	X	X	X	X	X	X	X	X	X	X	X			X
Appendix	X		X	X				X		X	X	X			X
Glossary	X	X	X	X	X		X	X		X	X				X
Index	X	X	X	X	X			X	X	X			X	X	X
Chapter Introduction/Objectives			X	X	X		X		X	X				X	X
Chapter Vocabulary			X								X				
Study Questions	X		X		X					X	X	X	X	X	
Charts/Graphs		X	X					X	X			X			X
Teaching Aids/Information			X					X				X	X		
References/Bibliographs	X	X			X	X	X	X	X		X		X	X	X
Audio-visual Aids							X	X				X	X	X	
Key Sentence Italics								X							
Key Vocabulary Italics															X
Chapter Summary		X			X						X			X	
Readability Grade Level	17+	17+	11	17	16	13	11	11	14	17+	13.5	9	14+	15	14

THE IMPACT OF COGNITIVE STYLE ON TEACHING AND LEARNING

Delcis Skipwith
Associate Professor
School of Nursing
University of Alabama in Birmingham

The Task Force and faculty at the University of Alabama School of Nursing in Birmingham accepted the challenge of determining how cognitive mapping of learning styles could enhance the teaching-learning process. We engaged in a series of workshops and activities which increased our knowledge, skills and proficiency in the use of cognitive mapping. The task force selected a research project with the following purposes:

1. To determine differences in the cognitive maps of transfer and non-transfer students.
2. To determine differences between those nursing students who successfully complete each level of the curriculum and those who do not.
3. To determine correlations between cognitive styles and successful completion of the curriculum.

The methodology selected to answer the research questions was a longitudinal design which included the administration of the questionnaire for the development of a cognitive map of learning style at the following points in the curriculum sequence:

Administration of Questionnaire:

1. Initiation of first clinical nursing sequence
   Level II (Fall, 1978)
   (133 persons completed the questionnaire.)

2. Completion of first clinical nursing sequence
   Level II (Sophomore Year, Winter, 1979)
   (112 persons completed the questionnaire.)
   (11 persons completed Level II but did not complete the questionnaire.)

3. Completion of Level III (Junior Year)
   (Fall, 1979 if students continued with nursing courses from Level II)

4. Completion of Level IV (Senior Year)
   (Summer, 1980)

Additionally, we collected data on the teaching learning strategies that were used during each of these periods.

The identified teaching strategies revealed that a variety of teaching strategies was used--lecture, small group activities, and independent study. Instruction relied most heavily on verbal, written and visual communication skills. Students were expected to get the majority of their information from reading, listening and seeing. Apparently, a cognitive style of learning map which includes the following symbols would be an asset to these students:

T(AL) - the sound of words
T(AQ) - the sound of numbers
T(VL) - the written word
T(VL) - the written number

Q(A) - auditory
Q(V) - visual

The predominance of involvement with the teacher, expect in the independent study strategy, would indicate a possible F (family, authority) appearing under cultural determinants. Hunches about modalities of inference cannot be made at this point with the available information.

The identified strategies are not unique, but are the basic, well-known strategies generally utilized by educators. Some students may need to make modifications in their learning preferences either through the selection of additional printed learning materials, selection of A.V. materials or the combining of interpersonal interactions.

Although all of the data have not been collected or analyzed for determination of answers to the research questions, a few observations have provided some information and stimulated more questions. Among our observations are:

> **Students have access to limited information about their learning preferences.** During discussions of cognitive mapping and learning styles with students we have heard the following comments: "I didn't know that." "No wonder I am failing the tests, I am studying alone when my map shows that I would probably do better by studying with others." "It sure helps to know this information." One of our priorities should be to help learners become aware of the strengths and weaknesses of their cognitive styles. Some ways of accomplishing this are:
>
> > Map students: discuss and interpret the map with the students.
> >
> > Help students analyze their approach to learning by keeping a behavioral and affective diary -- what they did, how they felt, and time periods.
> >
> > Have the students survey their own (and those of classmates) styles of learning. The survey may include such items as:
> >
> > > I am most alert for learning new things in the ______________________________
> > >
> > > The easiest way(s) for me to learn something is to ______________________________

112

Learning situations which help/hinder me most are ______________________________

I work best alone, with selected others

One accomplished person who worked in a nonroutine fashion is _________________________

Conduct observational mapping.

When students have information about their learning preferences, they can become more efficient partners in the teaching-learning process and can assume more responsibility for the manipulation of learning activities according to their special needs. Students can become more self-directed and independent. Teachers can also use the strengths of students to help them overcome their weaknesses in learning styles.

When teachers realize there are no "right" or "wrong" styles, they are more willing to share their learning style preference with colleagues and with students. There may be "differences" in styles. Teachers are aware of the impact of these preferences on identifying learner objectives, presenting content, selecting learning activities and evaluating outcomes.

Understanding of cognitive style can aid the educators in interpreting students' performance on teacher-made and standardized tests as well as clinical performance. Some test items may penalize students with particular cognitive styles and facilitate the performance of other students. An examination of the error made by students on tests will provide information about cognitive styles as well as about the number of incorrect items.

The faculty did not accept the concept of cognitive style mapping without asking questions and formulating some of these questions into research questions. Research questions stemming from the practice setting and the eduational arena have been formulated and included such ideas as matching individual cognitive styles to learning materials, identifying regional differences in cognitive styles and determining the impact of cognitive style on patient education.

A style in itself is not inherently good or bad. Success of a teaching style is not determined simply by the style itelf but by the appropriateness of the style to the particular situations. The effective teachers are those who can match their style of teaching to the needs of the students, the specific content, and environmental consideration.

We are all unique individuals with individual differences, preferences and other idiosyncratic factors. These elements affect teaching and learning.

Students do not learn for a variety of reasons. The learning style may be just one of the explanatory reasons. Therefore, it is incumbent upon educators to continue to seek out all parts of the puzzle before attaching a "label" to the problem.

Knowledge of the cognitive style, teaching-learning principles, educational technology and humanism helps the educators maximize the strengths of the individual's learning style and minimize, reduce or control the weaknesses.

Some additional questions about cognitive styles are:

> Does the cognitive style of a student influence his learning ability?
>
> Does cognitive style determine what a student chooses to learn?
>
> Does cognitive style interact with teaching method to produce different optimum learning situations?
>
> Does the type of teaching methods to which students are exposed affect any change in cognitive style?
>
> Can teaching methods be designed to facilitate particular students with particular styles?
>
> Do audio-visual aids interact with the students' style to influence learning outcomes?
>
> Will matching the teaching strategy to the same type of learning style affect the speed of learning and the length of retention of information i.e., will the student learn more quickly and retain information longer?

REFERENCES

Allport, G. W. Personality: A Psychological Interpretation. New York: Holt, 1937.

Broverman, D. M. "Cognitive Styles and Intra-individual Variation In Abilities." Journal of Personality 28 (1960): 240-256.

Coop, R. H. and Sigel, I. E. "Cognitive Style: Implications For Learning and Instruction." Psychology in the Schools 8 (1971): 152-161.

DiStefano, J. J. "Interpersonal Perceptions of Field-independent and Field-dependent Teachers and Students." Disseration Abstracts International 31 (1970): 464A-464B.

Dressel, P. L. Handbook for Academic Evaluation. San Francisco: Jossey-Bass, 1976.

Garner, R., Holzman P. S., Klein, G., Linton, H. and Spence, D. S. "Cognitive Control: A Study of Individual Consistencies in Cognitive Behavior." Psychological Issues 1 (1959).

Hill, J. E. and Nunney, D. N. Personalizing Education Programs Utilizing Cognitive Style Mapping. Bloomfield Hills, Michigan: Oakland Community College, 1974.

James, C. D. R. "A Cognitive Style Approach to Teacher-pupil Interaction and the Academic Performance of Black Children." (Master's thesis, Rutgers University, 1973).

Kagan, J., Moss, H. A. and Sigel, I. E. "Conceptual Style and the Use of Affect Labels." Merril-Palmer Quarterly 6 (1960): 261-278.

Murphy, P. D. and Brown, M. M. "Conceptual Systems and Teaching Styles." American Educational Research Journal (November, 1970): 529-540.

Nunney, D. N. and Hill, J. E. "Personalized Education Programs." Audiovisual Instruction (February, 1972): 10-15.

Witkin, H. A., Moore, C. A., Goodenough, D. E. and Cox, P. W. "Field-dependent and Independent Cognitive Styles and Their Educational Implications." Review of Educational Research 49 (Winter, 1977): 1-64.

Witkin, H. A. "Cognitive Styles Across Cultures." In J. W. Berry and P. R. Dasen (Editors), Cultures and Cognition: Readings in Cross-Cultural Psychology. London: Metheun and Co. Ltd., 1974.

Witkin, H. A., Dyk, R. B., Paterson, D. H., Goodenough, D. R. and Kays, S. A. Psychological Differentiation. New York: Wiley, 1962.

A BRIEF GUIDE TO COGNITIVE STYLE MAPPING

Symbols and Their Meanings

Two types of symbols, theoretical (e.g., words and numbers) and qualitative (e.g., code data), are basic to the acquisition of knowledge and meaning. Theoretical symbols differ from qualitative symbols in that the theoretical symbols present to the awareness of the individual something different from that which the symbols are. Words and numbers are examples of theoretical symbols. Qualitative symbols are those symbols which present and then represent to the awareness of the individual that which the symbol is. (Feelings, commitments and values are some examples of the meanings conveyed by the qualitative symbols.)

FOUR THEORETICAL SYMBOLS:

1. T(AL) - Theoretical Auditory Linguistic - the sound of a word.
2. T(AQ) - Theoretical Auditory Quantitative - the sound of a number.
3. T(VL) - Theoretical Visual Linguistic - the written word.
4. T(VQ) - Theoretical Visual Quantitative - a written number.

The meaning of qualitative symbols is derived from three sources: Sensory stimuli, cultural codes (games), and programmatic effects of objects. There are 15 qualitative symbols. Five of them are associated with sensory stimuli:

1. Q(A) - auditory - the ability to perceive meaning through the sense of hearing;
2. Q(O) - olfactory - the ability to perceive meaning through the sense of smell;
3. Q(S) - savory - the ability to perceive meaning by the sense of taste;
4. Q(T) - tactile - the ability to perceive meaning by the sense of touch;
5. Q(V) - visual - the ability to perceive meaning by the sense of sight;
6. Q(P) - proprioceptive - sometimes referred to as the sixth sense - vehicle for conveying meanings associated with "programmatic effects";
7. Q(CEM) - code-empathetic - the ability to identify with, or have a vicarious experience of, another person's feelings, ideas or volitions;

8. Q(CES) - code-esthetic - the ability of the individual under consideration to view with enjoyment the "beauty" and "pureness" of a resulting product, situation or idea;
9. Q(CET) - code-ethic - a commitment to a set of values, a group of moral principles, obligations, and/or duties;
10. Q(CH) - code-histrionic - staged behavior, or a deliberate exhibition of emotion or temperament to produce some particular effect on other persons;
11. Q(CK) - code-kinesics - the ability to communicate by means of non-linguistic functions such as blushing and motions of the body, such as shrugs, smiles and gestures;
12. Q(CKH) - code-kinesthetics - motor skill abilities;
13. Q(CP) - code-proxemics - the ability of an individual to judge the acceptable "critical" physical and social distance between himself and others as perceived by the other person;
14. Q(CS) - code-synnoetics - personal knowledge of oneself in all qualitative and theoretical symbolic forms in relation to one's environment.
15. Q(CT) - code-transactional - the ability to maintain a positive communicative interaction which significantly influences the goals of the persons involved in that interaction.

CULTURAL DETERMINANTS

The meanings that man assigns to symbols shape and are shaped by his culture. The main cultural influences, or "cultural determinants" of the meanings of symbols, are family, associates and individuals.

F - Family　　I - Individual　　A - Associates

MODALITIES OF INFERENCE

The forms of inference the individual uses in the process of deriving meaning:

M - Magnitude inference process is a form of "categorical thinking," and utilizes norms categorically classified, and attitudes accepted as true by the individual as the basis for acceptance or rejection of advanced hypotheses.
D - Difference deals with hypotheses of difference, such as one-to-one contrasts or comparisons of selected characteristics or measurements.
R - Relationship process considers a relationship between two or more characteristics of measurements.
L - Appraisal type of inference considers, with equal weight, hypotheses of all the previous three (magnitude, difference and relationship) in arriving at a probable conclusion.

CULTURAL AWARENESS

Norma Rawlings and Ann Morgan
Assistant Professors
School of Nursing
University of Maryland at Baltimore

Inevitably, different values, attitudes and lifestyles present problems at some point in daily interactions. Self-awareness, acceptance, and recognition by others help teachers and students to maintain some semblance of stability as they attempt to cope with this type of conflict. How can one relate effectively to the culturally different student[1] without jeopardizing the teaching-learning process? This paper presents a few of the activities used during the past 2½ years in helping faculty develop a keener awareness of self and others.

The faculty endorsed the premise that the more one knows about self, the more open and accepting one is to the difference of others. The JoHari window is used as an illustration of progression of self awareness.

Known Only To Self	Known To Self And Others
Known Only To Others	Known Neither To Self Or Others

---

[1] Factors used to identify the culturally different student include: race, sex, language, age, and environment, i.e., rural or urban.

Known To Self And Others	Known Only To Others
Known Only To Self	Known Neither To Self Or Others

The more open and known one is to self and others, the more willing one is to learn about differences in others and to accept them as valuable in a teaching-learning situation.

Several methods are useful in assisting faculty to become more aware of themselves as preceived by others. These methods are particularly useful as feedback and validation mechanisms related to attitudes in working with students of different cultural and educational backgrounds.

For example, word association is an affective technique. Participants are instructed to list five words or phrases that immediately come to their minds when they think of an individual who is of a different culture. The list is shared with others. The discussion following this exercise directs attention to the reasoning for selections and can alleviate some of the common misconceptions about people. What thoughts or phrases occur to you when you think of someone culturally different? Your thoughts most likely reflect specific characteristics associated with a particular group, both negative and positive. Free association must take place in a non-threatening environment where people can share, without fear of reprisal, perceptions of positive as well as negative characteristics of others.

Another method for examining attitudes and values involves the use of media. A slide-tape of various lifestyles that are different from those of the faculty can be effective. It can be used to increase an awareness of other cultures, ethnic groups and to promote mutual respect for these groups. Faculty and students can be involved in the development of the tapes. This involvement will heighten interest and participation. Films also can be used effectively to initiate discussions. For example, the film, "Whose Life Is It Anyway?", examines the quality of life concepts and can stimulate educators to examine their beliefs and feelings.

Before people can develop an "appreciation" for other cultures or differing beliefs and lifestyles, they must re-analyze their own attitudes and beliefs.

MULTISENSORY INSTRUCTION

Elnora Daniel
Coordinator, Master's Program
School of Nursing
Hampton Institute

An overview of the four-phase sequence for instructional development initiated at Hampton Institute School of Nursing in 1973 follows.

Phase I Assessment

During this phase the faculty examined varied approaches to multisensory instruction in work sessions focused on the work of Postlethwait, Lange, and Keller. Instructors visited several programs implementing the multisensory concept, e.g., Virginia Commonwealth University (Richmond), University of Maryland at Baltimore, Delta Community College (Michigan), Arizona State University (Tempe), California State University (Los Angeles), to learn about organizational schema and the selection of materials. Following these experiences the faculty decided to use a self-paced modified auto-tutorial approach for the teaching and learning experiences in nursing at the sophomore level. This approach is a combination of Keller's personalized system of instruction and the auto-tutorial system. It employs textbooks, unit study guides, mastery tests, and undergraduate tutors.

Dr. Elnora Daniel was unable to present the paper on multisensory instruction at the third regional meeting. However, because this was an area of interest to many nurse educators, we include it in this publication.

Phase II Planning

The following assumptions were basic to the development of plans: (1) Learning is an independent process. (2) Learners have heterogeneous backgrounds and different learning rates. (3) Avenues to facilitate different learning rates of individual learners promote greater retention and transfer of knowledge as well as increase learner motivation. (4) The learner must have the opportunity to experiment, explore, and practice or repeat cognitive, psychomotor and affective skills as many times as he feels is necessary. (5) The educational process can be modeled into a scientific framework which involves carefully designed instructional programs to meet particular objectives. (6) The facilitator of learning is responsible for designing the learning mileu which provides opportunity for learner involvement and creative expression. (7) Teaching and learning must emphasize process rather than facts and details.

The approach involves the use of: (1) Group Assembly Sessions (G.A.S.), (2) Small Group Sessions (S.G.S.), (3) Independent Study Sessions (I.S.S.), (4) Oral Quiz Session (O.Q.S.), (5) Auto-tutorial Laboratory Sessions (A.T.L.), (6) Clinical Laboratory Sessions (C.L.S.), (7) Performance Test Sessions (P.T.S.), (8) Psychomotor Simulation Sessions (P.S.S.), (9) Pre-testing Sessions, (10) Post-testing Sessions, and (11) Interim Validation Sessions. Learners enrolled in Nursing Process I and II can set their own learning pace. They can finish a year's course in one semester (an accelerated learner), finish a year's course in a year (a normal learner), or take a year and a half (a slow learner).

Phase III Implementation

This approach increases student-teacher interaction, broadens horizons, and increases understanding between students and teacher. It enables students to learn selected materials at their own rate. Thus, faculty can be more flexible in assisting the more accelerated student to gain greater knowledge and the less gifted student to become more proficient in the specific area of study. This approach also reduces some of the frustrations encountered by either the slow or rapid learner.

The traditional role of the teacher is also modified to accommodate the new teaching-learning strategies of individualized instruction. The role changes from the traditional "spoon feeder" to that of facilitator, diagnostician, motivator, organizer-manager and resource person. The facilitator of learning is a good model for learner imitation, provides opportunities for learners to practice, repeats cognitive, psychomotor and affective skills, and gives appropriate reinforcement and immediate feedback. The diagnostician assesses the physical and mental readiness of learners for further educational endeavors, provides an emotional milieu that enhances learning, checks oral and written assignments, listens to learners, and assists the learners in selecting various learning experiences to facilitate achievement of course objectives at their own rate. The motivator of learning plans collaboratively with learners in the varied sessions, e.g., Group Assembly Sessions, Small Group Sessions, Psychomotor Simulation Sessions, and Clinical Laboratory Sessions, in an attempt to stimulate student interest and enthusiasm for the educational process. The organizer-manager designs teaching-learning strategies and experiences and makes these resources available to learners at the right time and place. The resource person assists learners in finding solutions to educational problems.

The faculty responsible for teaching Nursing Process I and II developed 39 self-instructional learning modules for the two-semester course. The learning syllabus format contains an introductory statement, the course outline, a table of contents, terminology and guidelines for learners in using the auto-tutorial laboratory. (All modules were field-tested on student and faculty enrolled in the summer session.) Appropriate media, either purchased or developed by the faculty, were selected for each learning module. The faculty developed the following video tapes to augment various learning packages: "The Back Rub," "The Unoccupied Bed," and "The Nursing Process."

Initially, the faculty was assigned to work with students who had grouped themselves on certain learning modules. However, since this method proved ineffective, specific instructors are assigned to eight students and are responsible for all Small Group Sessions (S.G.S.), Oral Quiz Sessions (O.Q.S.), Clinical Laboratory Sessions (C.L.S.), and performance tests. This change in procedure enhances the communication process and the individualization of instruction.

All learners take a pre-test to determine the extent of knowledge related to a specific learning package. Learners attend General Assembly Sessions once per week to hear guest lecturers, view long films, or receive instructions. They meet one hour each week in Small Group Sessions to discuss aspects of the learning experiences with an assigned instructor. Participation in the Auto-Tutorial Lab, open Monday-Saturday, is mandatory. Most learners spend an average of 4 hours weekly in this lab. Each determines the amount of time needed to achieve the specific goals of an assignment. A laboratory assistant administers and scores written and performance tests. Instructors and a technician are available to assist students in the Auto-Tutorial Lab. If audio-visual materials are not available or live demonstrations are more appropriate, instructors or the lab assistant demonstrate the necessary skill. In addition to assignments in the Auto-Tutorial Lab, learners spend nine hours each week in the clinical laboratory.

Although the time interval allotted the course is personalized, each learner receives a calendar depicting the normal paced learner's progress. Learners must complete three-fourths of the required course to receive an "incomplete" grade.

Phase IV Evaluation

Upon completion of a learning module the student, faculty, and staff, use an evaluation questionnaire to assess the effectiveness and relevancy of the program. These assessments are used to determine the need for program change.

A majority of the students likes the approach and would recommend it to friends. The independence, increased opportunity to practice, more immediate feedback and reinforcement, and the varied measures to accommodate learning styles are some of the positive features students identify. Although students are in the center of the teaching and learning process and assume more responsiblity for their learning, some need more structure. Otherwise, they tend to delay learning. It is important to provide a moderate amount of structure for learners in transition from a traditional educational process to a new approach.

Faculty believe the approach "improves each year" and helps to retain "more people in nursing."

ROSTER OF CONFERENCE PARTICIPANTS

Representatives From Institutions

ALABAMA

Samford University
Judy Ann Bourrand
Holly Hurst
Cammie Quinn

Troy State University
Alice Roberts
Deborah Templeton

University of Alabama in Birmingham
Janet S. Awtrey*
Milly Cowles*
Kathy Goldblatt
Kathleen Mikan*
Delois Skipwith*

ARKANSAS

Southern Arkansas University
Wendy Bonner
Billie R. Cameron
Mary Scott
Pat Williams

University of Arkansas at Fayetteville
James O. Hammons

University of Central Arkansas
Ellen Lachowsky
Anna Lee Sanders

FLORIDA

Bethune Cookman College
Mary Eaves
Barbara Engriam
Daphne Shah

Daytona Beach Community College
Shirley A. McCary
Marilee Wilkinson

Polk Community College
Alberta Dodd
Kathy McMicken
Barbara L. Richards
Terri Sapp

Santa Fe Community College
Vivian Filer
Betty Hanson
Ruby Philpot
Faye Wilson

University of Florida at Gainesville
Sue Legg

Valencia Community College
Ann Carigan
Susie Forehand
Annie Bell Johnson
Gloria Pickar

---

*Program Participant

GEORGIA

Albany State College
- Mirian Loran Johnson

Emory University
- Rose Cannon
- Sylvia Fields
- LaRetta Garland*
- Maggie Gilead
- Carol Massee
- Jean Megenity

Georgia College
- Mary Cook

Georgia State University
- Louise B. Duncan

Valdosta State College
- Irma Jewell
- Patricia LaFountain
- Mary Margaret Richardson

West Georgia College
- Marie Guynn
- Bobbie Siler

KENTUCKY

Kentucky State University
- Karen Bickel
- Cathy Cooke
- Sharon Grosse
- Patti Hunsicker
- Jean Jeffers
- Veneda S. Martin
- Barbara Miranda
- Patsy O. Turner
- Mary E. Wordell

LOUISIANA

Dillard University
- Betty N. Adams

Northwestern College
- Patricia Ritchie

MARYLAND

University of Maryland at Baltimore
- Mildred S. Kreider
- Ann Morgan*
- Norma Rawlings*
- Rosetta Sands

MISSISSIPPI

Itawamba Junior College
- Hal E. White

Northeast Mississippi Junior College
- Paula H. Stennett

Mississippi College
- Patricia A. Waltman

University of Mississippi
- Delores Barlow

NORTH CAROLINA

Atlantic Christian College
- Joy F. Reed

James Sprunt Technical Institute
- Marsha R. Hunter
- Debra C. Paul

---

*Program Participant

NORTH CAROLINA (Continued

North Carolina A&T State University
Willie T. Ellis
Earcelle [illegible]. Evans
Miriam F. Foster
Marie W. Martin
Naomi H. Thomas
Margaret C. Warren

North Carolina Central University
Peggy Baker
Gwendolyn Jones
Johnea Kelly
Joan M. Martin
Sylvia O. Baker

SOUTH CAROLINA

Lander College
Betsy Barnes

TENNESSEE

Belmont College
Sharon Murphy

Lincoln Memorial University
Berta C. Roland

Southern Missionary College
Terri Rouillier
Callie Thatcher

Tennessee State University
Carol C. Chapman
Linda G. Goode
Caryn Gramaldi
Jean M. Jenkins
Karen F. Lusky

University of Tennessee at Knoxville
Kathleen Conlon
Sylvia Hart

TEXAS

Paris Junior College
Jan Gaines

Texarkana Community College
Karen Blackard
Carol Hodgson
Joyce White

Texas Christian University
Billie F. Hightower
M. Ann Richards

University of St. Thomas
Roslyan D. Booker
Shirley Dooling*
Mary Lee Guidry
Cindy Martindill
Ellis L. Nordyke

VIRGINIA

J.S. Reynolds Community College
Sally L. Etkin
Jean Mosely
Frances B. Stanley

Tidewater Community College
Goldie Bradley
Fred H. Jeffcoate
Gail Kettlewell*
Shirley W. Lee
Juanita T. Tucker
Charlotte W. Thomas

WEST VIRGINIA

Shepherd College
Charlotte R. Anderson

---

*Program Participant

Representatives From Other Agencies

Georgia Board of Nursing
Diane Dillion
Julia E. Gould

Peachtree Parkwood Hospital (Atlanta)
Sandy Huggins*

Region IV, DHEW (Atlanta)
Marie Kennedy, Nursing Consultant
Susan Sparks, Nursing Consultant

Southern Regional Education Board
Eula Aiken, Project Coordinator
Audrey Spector, Nursing Programs Director
Cassandra Hill, Project Secretary

Timber Hills Mental Health Service (Mississippi)
Lois Hill

---

*Program Participant

LIST OF BOOKS ON DISPLAY

Affirmative Action Toward Quality Nursing Care for a Multiracial Society. Kansas City, Missouri: American Nurses' Association, 1976.

Afro-American Linguistic Patterns: Impact on Academic Success. Atlanta: Southern Regional Education Board, 1977.

Aiken, Eula, and John J. Stathas. *The Different Student*. Philadelphia: F. A. Davis Company, 1978.

Bevis, Em O. *Curriculum Building in Nursing*. St. Louis: C. V. Mosby Company, 1978.

Blubaugh, Jon A. *Crossing Difference . . . Interracial Communication*. Columbus, Ohio: Charles E. Merrill Publishing Company, 1976.

Boocok, Sorane S. *An Introduction to the Sociology of Learning*. Boston: Houghton Mifflin Company, 1972.

Brownlee, Ann T. *Community, Culture and Care*. Philadelphia: C. V. Mosby Company, 1978.

Centra, John A. *Strategies for Improving College Teaching*. Washington, D. C.: The American Association for Higher Education, 1972.

Clark, Carolyn Chambers. *Classroom Skills for Nurse Educators*. New York: Springer Publishing Company, Inc., 1978.

Competencies of the Associate Degree Nurse on Entry into Practice. New York: National League for Nursing, 1978.

Cronbach, Lee J. and Richard E. Snow. *Aptitudes and Instructional Methods*. New York Irvington Publishers, Inc., 1977.

Cross, K. Patricia. *Beyond the Open Door*. San Francisco: Josey-Bass, Inc., 1972.

Crow, Mary Lynn. *Teaching on Television*. Arlington, Texas: Faculty Development Resource Center, The University of Texas at Arlington, 1977.

Cultural Dimensions in the Baccalaureate Nursing Curriculum. New York: National League for Nursing.

Dalis, Gus T. and Ben B. Strasser. Teaching Strategies for Values Awareness and Decision Making in Health Education. Columbia, Ohio: Charles B. Slack, Inc., 1977.

Dembo, Myron H. Teaching for Learning. Santa Monica, California: Guadyear Publishing Company, Inc., 1977.

de Tornyay, Rheba. Strategies for Teaching Nursing. New York: John Wiley and Sons, Inc., 1971

Eble, Kenneth E. The Craft of Teaching. San Francisco: Jossey-Bass Publishers, 1977.

Egan, Gerald. Face to Face. Monterey, California: Brooks/Cole Publishing Company, 1973.

Faculty Development in Nursing Education: A Report. Atlanta: Southern Regional Education Board, 1977.

Faculty Evaluation for Improved Learning. Atlanta: Southern Regional Education Board, 1978.

Gaff, Jerry G. Toward Faculty Renewal. San Francisco: Jossey-Bass Publishers, 1976.

Gagne, Robert M. The Conditions of Learning. New York: Holt, Rinehart and Winston, Inc., 1970.

Grant, Gerald. On Competence. San Francisco: Jossey-Bass Publishers, 1979.

Griffiths, Andre and John Winterbottom. A Guide to ETS Activities Related to Minority and Disadvantaged Groups. Princeton: Educational Testing Service, 1977.

Guinie, Kathleen K. Teaching and Learning in Nursing. New York: Macmillan Publishing Company, Inc., 1978.

Hunkins, Francis P. Questioning Strategies. Boston: Allyn and Bacon, Inc., 1973.

Herrscher, B. R. Instructional Effectiveness Inventory. Houston: Archem Company, 1976.

Heywood, John. Assessment in Higher Education. New York: John Wiley and Sons, Inc., 1977.

Knowles, Malcolm S. Self Directed Learning. New York: Association Press, 1975.

Labov, William. Language in the Inner City: Studies in the Black English Vernacular. Philadelphia: University of Pennsylvania Press, 1972.

Lange, Crystal M. Identification of Learning Styles. New York: National League for Nursing, 1979.

Lynch, Eleanor A. Evaluation: Principles and Procedures. New York: National League for Nursing, 1978.

Mayer, Robert F. Developing Attitudes Toward Learning. Palo Alto, California: Fearon Publishers, 1968.

Mayer, Robert F. and Peter Pipe. Analyzing Performance Problems. Belmont, California: Fearon Publishers, 1970.

Martinez, Ricardo A. Hispanic Culture and Health Care. St. Louis: C. V. Mosby Company, 1978.

Maxwell, Martha. Improving Student Learning Skills. San Francisco: Jossey-Bass Publishers, 1979.

Millar, Dan P. and Frank E. Millar. Messages and Myths. New York: Alfred Publishing Company, Inc., 1976.

Milton, Ohmer. On College Teaching. San Francisco: Jossey-Bass Publishers, 1978.

Mouly, George J. Psychology for Effective Teaching. New York: Holt, Rinehart, and Winston, Inc., 1973.

Nieves, Luis. The Minority Student Experience: A Case for the Use of Self-Control Systems. Princeton: Educational Testing Service, 1978.

Productivity. New York: National League for Nursing, 1977.

Reilly, Dorothy E. Teaching and Evaluating the Affective Domain in Nursing Programs. Columbus, Ohio: Charles B. Slack, Inc., 1978.

Roueche, John E. and Suanne D. Roueche. Developmental Education. Atlanta: Southern Regional Education Board, 1977.

Roueche, John E., Barbara P. Washburn and Oscar G. Mink. Assessing Student Opinions of the Learning Experience. Manchaca, Texas: Sterling Swift Publishing Company, 1976.

Roueche, John E., Barbara P. Washburn, and Oscar G. Mink. Confronting Student Attitudes. Manchaca, Texas: Sterling Swift Publishing Company, 1976.

Roueche, John E. and Oscar G. Mink. Improving Student Motivation. Manchaca, Texas: Sterling Swift Publishing Company, 1976.

Roueche, John E. and Jerry J. Snow. Overcoming Learning Problems. San Francisco: Jossey-Bass Publishers, 1978.

Santiago, Isaura S. A Community's Struggle for Equal Educational Opportunity: Aspira vs. Board of Education. Princeton: Educational Testing Service, 1978.

Schweek, Jean E. and Kristine M. Gebbie. Creative Teaching In Clinical Nursing. St. Louis: C. V. Mosby Company, 1976.

Sieber, Joan E., Harold F. O'Neil and Sigmund Tobias. Anxiety Learning and Instruction. Hillsdale, New Jersey: Lawrence Erlbaum Associates, Publishers, 1977.

Socialization and Resocialization of Nurses for Professional Practice. New York: National League for Nursing, 1977.

Spector, Rachel E. Cultural Diversity In Health and Illness. New York: Appleton-Century-Crofts, 1979.

Student Performance Evaluation: The Hidden Agenda In Nursing Education. Atlanta: Southern Regional Education Board, 1978.

The Student Pushout. Atlanta: Southern Regional Education Board, 1973.

Thomas, Ellen Lamat and H. Alan Robinson. Improving Reading In Every Class. Boston: Allyn and Bacon. Inc., 1973.